Towards statistical earthquake forecasting

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The thermal springs of the Port of Ischia and their temperature variations: a possible precursor phenomenon of the planetary seismic maxima (updated version).

Prof. Giulio Grablovitz (1887) wrote:

In the first three months of the year 1887 the thermo-mineral waters that flow near the sea often decreased in flow and temperature and twice failed at all for a period of several days. For the mere fact that these periods began in coincidence, the first time with the earthquakes of the Abruzzi, and the second with those of Liguria, the phenomenon attracted particular attention.

Let's make the following calculations:

Sun-Earth-Jupiter opposition = 11,960 days (11,960 multiplied by 3) = **35,880 days**

Venus-Sun-Earth superior conjunction = 18,105 days (18,105 multiplied by 2) = **36,210 days**

Multiple Saros Cycle = 122 years 185 days 20 hours 15.46 minutes = **44.716 days**

We:

23 February 1887 05:21 earthquake in western Liguria magnitude 6.27

February 22, 1887 9:40:22 PM New Moon

February 22, 1887 Annular Solar Eclipse

February 22, 1887 + 122 years 185 days 20 hours 15.46 minutes = **44,716 days** =

26 August 2009

August 25, 2009 16:58 Etna earthquake magnitude 3.6

August 20, 2009 10:01:35 AM New Moon 27°31.34 360,930.86 km

August 27, 2009 11:41:59 AM Moon in First Quarter 04°20.38 396,607.08 km

February 22, 1887 + **35,880 days** =

May 19, 1985

14 May 1985 and 19 May 1985 earthquakes in the Strait of Messina and L'Aquila with magnitude 3.8 and 4.2 approximately

April 19, 1887 (Sun-Earth-Jupiter opposition) – April 23, 1887 New Moon

April 19, 1887 + **35,880 days** =

July 14, 1985 (August 5, 1985 Sun-Earth-Jupiter opposition)

April 23, 1887 + **35,880 days** =

July 18, 1985

July 17, 1985 New Moon

10 July 1985 earthquake of magnitude 3.76 in the Parma Apennines

July 14, 1985 + **29 days 12 hours 44 minutes** (synodic month) =

August 12, 1985

or:

17 July 1985 + 29 days 12 hours 44 minutes =

August 15, 1985

08 August 1985 1985 earthquake in the Parma Apennines magnitude about 3.7

08 August 1985 earthquake in the southern Tyrrhenian Sea magnitude 4.2

09 August 1985 earthquake in the Gulf of Castellammare (Sicily) magnitude 4.5

15 August 1985 earthquake in the Parma Apennines magnitude 4.5

August 16, 1985 New Moon

We also have:

April 19, 1887 (Sun-Earth-Jupiter) minus **35,880 days** =

January 22, 1789

7 February 1789 earthquake in southern Calabria of magnitude 5.1

(January 26, 1789 New Moon; February 10, 1789 Full Moon)

October 28, 1928 Full Moon

October 29, 1928 (Sun-Earth-Jupiter opposition) + **11,960 days** =

July 28, 1961

July 27, 1961 Full Moon

3 August 1961 earthquake in Lunigiana magnitude about 4.2

April 20, 1909 New Moon

April 28, 1909 (Venus-Sun-Earth Superior Conjunction) + **36,210 days** =

17 June 2008

June 14, 2008 Strong earthquake in Japan magnitude 6.9

June 18, 2008 Full Moon

November 28, 1917 Full moon; November 29, 1917 (Sun-Earth-Jupiter opposition)

November 29, 1917 + **36,210 days** =

18 January 2017

18 January 2017 Magnitude 5.3 earthquake in L'Aquila

We also note that:

February 15, 1873 + **11,960 days** (Sun-Earth-Jupiter) =

15 November 1905;

November 12, 1905 Full Moon

26 November 1905 Earthquake in Irpinia of magnitude 5.2 approx.

November 26, 1905 New Moon

September 4, 1873 + **11,960 days** (Earth-Sun-Jupiter) =

June 4, 1906

June 4, 1906 Earthquake in Nicosia in Sicily of magnitude 5.2 approximately

June 6, 1906 Full Moon

And that:

July 16, 1872 + **18,105 days** (Venus-Sun-Earth) =

February 10, 1922

27 March 1922 Earthquake in the Volsini Mountains of magnitude 4.4;

March 28, 1922 New Moon (April 4, 1922 Sun-Earth-Jupiter opposition)

May 5, 1873 + **18,105 days** (Sun-Venus-Earth) =

November 30, 1922

29 December 1922 Earthquake in Val Roveto of magnitude 5.2

January 3, 1923 Full Moon

January 23, 1917 (New Moon) + **36,735 days 18 hours 3,462 minutes =**

21 August 2017 earthquake in Ischia magnitude 4

August 21, 2017 New Moon and Total Solar Eclipse

July 28, 2017 Indonesia magnitude 6.2

21 July 2017 Moon passage at perigee; August 7 Full Moon

September 7, 2017 in Mexico magnitude 8.2

September 6, 2017 Full Moon

May 20, 1883 Eruption, earthquake and tsunami in Krakatoa

22 May Full Moon

28 July 1883 earthquake in Casamicciola, strong shock

August 3, 1883 New Moon

2 September 1883 Colli Albani strong shock 4.7

September 1, 1883 New Moon

7 November 1883 Monti della Laga strong shock 5.1

13 November 1883 Etna strong shock about 3

November 14, 1883 Full Moon

Now, we have:

27 January 1887 Earthquake in L'Aquila magnitude 4.2

January 24, 1887 New Moon

Sun-Earth-Jupiter opposition = 11,960 days (11,960 multiplied by 3) = **35,880 days**

Venus-Sun-Earth superior conjunction = 18,105 days (18,105 multiplied by 2) = **36,210 days**

January 24, 1887 + **35,880 days** =

April 20, 1985

April 6, 1985 (Sun-Venus-Earth)

16 April 1985 Earthquake in Greece magnitude 4.1

24 April 1985 Southern Tyrrhenian earthquake magnitude 4

April 20, 1985 New Moon; April 22, 1985 Moon passage to the ascendant node

January 24, 1887 + **36,210 days** =

March 16, 1986

10 March 1986 Earthquake in the southern Tyrrhenian Sea magnitude 4.5 approx.

March 10, 1986 New Moon

April 9, 1986 Partial eclipse of the Sun

February 19, 1986 (Earth-Sun-Jupiter)

1, 2 and 22 February 1986 Earthquakes at Etna magnitude 3.85, 4 and 3.5

23 February 1887, 05:21 Western Liguria earthquake magnitude 6.27

February 9, 1986 New Moon, February 24, 1986 Full Moon

Let's start with the earthquake of 21.08.2017 in Casamicciola d'Ischia

21 August 2017 Earthquake in Casamicciola Terme (Ischia (Na)) – magnitude 3.9

Additional earthquakes:

23 August 2017 southern Ionian Sea magnitude 3.8

25 August 2017 Marche magnitude 3.3 and Island of Malta magnitude 4.0

August 27, 2017 Papua New Guinea magnitude 6.2

August 31, 2017 Indonesia (South Sumatra) magnitude 6.5

1 September 2017 Marche magnitude 3.2 , Southern Tyrrhenian Sea magnitude 3.4 and Greece magnitude 5.1

3 September 2017 North Korea magnitude 6.3 and in the province of Brescia (Lombardy) magnitude 3.4

September 4, 2017 south Georgia - south Sandwich Islands magnitude 6.2

5 September 2017 in L'Aquila magnitude 3.7

6 September 2017 province of Belluno (Veneto) magnitude 3.4

September 8, 2017 Gulf of Mexico magnitude 8 (Chiapas, along the coast)

10 September 2017 Emilia Romagna and Abruzzo magnitude 3.7

September 16, 2017 Croatia magnitude 3.3

18 September 2017 north-eastern Sicilian coast (Messina) magnitude 3.1; Ragalna (Catania) magnitude 3.2; Oaxaca (Mexico) magnitude 6; Southern Albanian coast magnitude 3.8

September 19, 2017 Central Mexico magnitude 7.1

20 September 2017 New Zealand magnitude 6; Japan magnitude 6.2; Vanuatu Islands magnitude 6.3

September 23, 2017 Oaxaca (Mexico) magnitude 6.2

September 25, 2017 Papua New Guinea magnitude 6

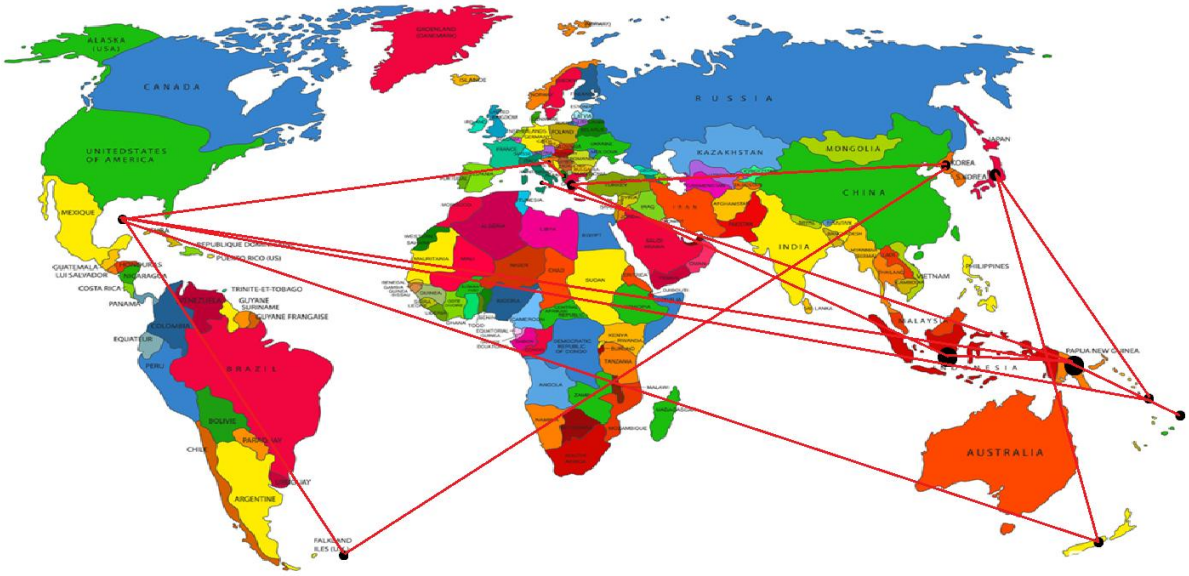
26 September 2017 Tonga magnitude 6.4

Lunistizi August-September 2017:

AGOSTO									
Lunedi	7	Agosto	2017	18:10:37	○	Luna Piena	♒ Acquario	15°25'10	394 795.11 km
Martedi	15	Agosto	2017	01:15:04	◑	Ultimo quarto	♉ Toro	22°25'02	371 341.67 km
Lunedi	21	Agosto	2017	18:30:11	●	Luna Nuova	♌ Leone	28°52'56	372 113.99 km
Martedi	29	Agosto	2017	08:12:59	◐	Primo quarto	♐ Sagittario	06°11'18	403 525.85 km
SETTEMBRE									
Mercoledi	6	Settembre	2017	07:02:48	○	Luna Piena	♓ Pesci	13°53'05	384 378.69 km
Mercoledi	13	Settembre	2017	06:25:01	◑	Ultimo quarto	♊ Gemelli	20°39'35	369 863.90 km
Mercoledi	20	Settembre	2017	05:29:52	●	Luna Nuova	♍ Vergine	27°27'05	382 736.30 km
Giovedi	28	Settembre	2017	02:53:31	◐	Primo quarto	♑ Capricorno	05°10'53	403 933.42 km

The earthquakes from 21 August to 26 September 2017 occurred mainly in the Full Moon and New Moon phases (Szygy Tides), according to the Seismic Theory of the Tides of the brilliant Prof. Giulio Grablovitz.

In the figure, representation of the seismic radiant of southern Italy, which is connected with the most important seismic radians of our planet.



In the figure, the seismic radiant of southern Italy, and the various "connections" with the various planetary seismic radians

21 September 2017 earthquake in Messina Magnitude 3.2

September 20, 2017 New Moon

About the following multiples and submultiples of the Saros cycle

100 years 203 days 18 hours 3,462 minutes

33 years 189 days 14 hours 1,154 minutes

The sum is equivalent to: **48,939 days** = 134 years 28 days 8 hours 4,616 minutes

28 July 1883 Earthquake in Casamicciola d'Ischia Magnitude 5.8

July 28, 1883 + 134 years 28 days 8 hours 4,616 minutes =

25 August 2017

We observe how from this calculation it can be deduced that adding a multiple of the Saros Cycle, precisely 134 years 28 days 8 hours 4,616 minutes, starting from July 28, 1883, the date of the Casamicciola d'Ischia earthquake, we obtain August 25, 2017, a date close to the seismic event that struck the same location on August 21, 2017

Analyzing further earthquakes.

March 4, 1881 Casamicciola d'Ischia earthquake intensity 9 degrees on the Mercalli Scale (Grablovitz)

(February 28, 1881 New Moon)

March 4, 1881 + 134 years 28 days 8 hours 4,616 minutes =

1 April 2015

(April 4 2015 Full Moon)

March 21, 2015 earthquake in Mexico magnitude 5.3

30 March 2015 Papua New Guinea earthquake magnitude 7.6

3 April 2015 earthquake north coast Sicily magnitude 3.7

April 15, 2015: earthquake in the Tyrrhenian Sea off the western Calabrian coast, magnitude 4.3.

16 April 2015 earthquake in the province of Foggia magnitude 3.9

25 April 2015 earthquake in Nepal magnitude 7.8

24 April 2015 earthquake in New Zealand magnitude 6.2

22 April 2015 earthquake in Greece magnitude 4

9 May 2015 earthquake in the Tyrrhenian Sea between the Aeolian Islands and the western Calabrian coast magnitude 4.5

Lunistizi March, April and May 2015:

MARZO									
Giovedi	5	Marzo	2015	18:05:24	○	Luna Piena	♍	Vergine	14°50'24	406 322.33 km
Venerdi	13	Marzo	2015	17:47:55	◑	Ultimo quarto	♐	Sagittario	22°49'24	382 286.76 km
Venerdi	20	Marzo	2015	09:36:11	●	Luna Nuova	♓	Pesci	29°27'19	357 914.61 km
Venerdi	27	Marzo	2015	07:42:36	◐	Primo quarto	♋	Cancro	06°19'21	392 475.81 km
APRILE									
Sabato	4	Aprile	2015	12:05:34	○	Luna Piena	♎	Bilancia	14°24'09	402 832.89 km
Domenica	12	Aprile	2015	03:44:27	◑	Ultimo quarto	♑	Capricorno	21°55'28	375 812.57 km
Sabato	18	Aprile	2015	18:56:51	●	Luna Nuova	♈	Ariete	28°25'19	363 214.92 km
Sabato	25	Aprile	2015	23:55:10	◐	Primo quarto	♌	Leone	05°27'16	399 213.81 km
MAGGIO									
Lunedi	4	Maggio	2015	03:42:04	○	Luna Piena	♏	Scorpione	13°22'42	394 985.19 km
Lunedi	11	Maggio	2015	10:36:08	◑	Ultimo quarto	♒	Acquario	20°25'48	371 500.75 km

March 20, 2015 New Moon; April 4, 2015 Full Moon; April 18 New Moon; May 4 Full Moon

It should be noted that the seismic event that affected Casamicciola d'Ischia on March 4, 1881, occurred at 13:00 and that the high tide phenomenon in that period (around March 7-8), occurs around 12:45 – 13:45

2 February 1828 earthquake in Casamicciola d'Ischia of magnitude 4

(February 1, 1828 Full Moon)

February 2, 1828 + 122 years 185 days 20 hours 15.46 minutes =

August 6, 1950

18 July 1950 earthquake north-eastern Sicily magnitude 4.7

(July 15 New Moon; July 29 Full Moon)

August 5, 1950 Ecuador earthquake magnitude 6.8

August 14, 1950 earthquake Northern Argentina magnitude 7.25-7.5

August 15, 1950 a violent earthquake magnitude 8.6 Richter devastated Tibet

August 31, 1950 earthquake Bosnia and Herzegovina magnitude 5.2

(August 13 New Moon; August 27 Full Moon)

5 September 1950 Gran Sasso earthquake magnitude 5.7

(August 27 Full Moon; September 4 Moon last quarter)

October 21, 1950 Tonga Islands earthquake magnitude 6.3

October 23, 1950 earthquake Guatemala magnitude 7.1

(October 25 Full Moon)

November 5, 1950 Japan earthquake magnitude 6.6

November 17, 1950 Mexico earthquake magnitude 6.1

(November 6 transition to the descending node; November 9 new moon; November 16 Moon last quarter; November 19 transition to the ascending node)

December 5, 1950 Japan earthquake magnitude 6.0

9 December 1950 Strait of Messina earthquake magnitude 4.4

(December 9 New Moon and perigee)

16 January 1951 earthquake in the Gargano magnitude 5.2

(January 12 Moon passage to the ascendant node)

It should be noted that the seismic event that affected Casamicciola d'Ischia on February 2, 1828, occurred at 9:15 a.m. and the high tide at that time occurred around 9:20 a.m

8 September 1905 Very strong earthquake in Calabria

(September 13 Full Moon)

September 8, 1905 + **35880 days** =

December 3, 2003

7 December 2003 earthquake in the Forlì area magnitude 4.2

16 December 2003 earthquake in the Vallo di Diano magnitude 4.2

December 26, 2003 earthquake in Iran magnitude 6.6

December 30, 2003 earthquake in Molise magnitude 4.5

January 8, 2004 earthquake in Ecuador magnitude 4.6

(December 6 Moon passage to rising node; December 8 Full Moon; December 22 Moon at perigee; December 23 New Moon; January 7, 2004 Full Moon)

September 8, 1905 + **36210 days** =

28 October 2004

25 October 2004 earthquake in Tuscany magnitude 2.7

5 November 2004 earthquake southern Tyrrhenian magnitude 4

September 8, 1905 + **18105 days** =

April 4, 1955

Strong earthquake magnitude 5.6 in southern Greece, Wednesday 13 Apr 1955

Now, we observe that, from the average of different dates (expressed in days) extrapolated from various seismic periodicities, we obtain the following result:

1/8 (36784 + 36673 + 36738 + 36650 + 36852 + 36801 + 36599 + 36636) = 36,716.625

And again, by adjusting the value obtained by subtracting 50 days from the previous expression, we obtain the further result:

1/8 (36,784 + 36,673 + 36,738 + 36,650 + 36,852 + 36,801 + 36,599 + 36,636) minus 50 = 36,666.625 days which we will express **100.45651 years:**

Therefore: 36,666.625 days, expressed in years, months and days is equal to 100.45651 years, i.e. 100 years 5 months 14.54 days

This is the reference we will take for all the next calculations we are going to make: 100.45651 years. This reference coincides almost perfectly with the dates on which the alignments between Sun-Earth and Jupiter occur. For example:

January 24, 1813 + 100.45651 years = July 9, 1913 (effective date July 5, 1913)

March 31, 1827 + 100.45651 years = September 14, 1927 (effective date September 22, 1927)

And so on...

Now let's take the date of a past earthquake. We will give some examples:

8 October 1639 earthquake in the Laga Mountains of magnitude 6.2

(October 11 Full Moon)

October 8, 1639 + 100.45651 years =

March 23, 1740

6 March 1740 earthquake in Garfagnana magnitude 5.64

26 March 1740 earthquake in Catanzaro magnitude 3.7

(March 8 Moon passage to the rising node; March 13 Full Moon; March 27 New Moon)

6 March 1740 earthquake in Garfagnana magnitude 5.64

(March 8 Moon passage to the rising node; March 13 Full Moon)

March 6, 1740 + 100.45651 years =

August 19, 1840

August 27, 1840 earthquake at Tuhinj Valley (Slovenia) of magnitude 5.28

(August 27 New Moon)

21 February 1841 earthquake in the Gargano of magnitude 5.17

(February 21 New Moon)

February 21, 1841 + 100.45651 years =

August 6, 1941

20 August 1941 earthquake in the Tavoliere delle Puglie with a magnitude greater than 5

(August 22, 1941 New Moon)

13 January 1915 Marsica earthquake of magnitude 7

(January 15, 1915 New Moon)

January 13, 1915 + 100.45651 years =

28 June 2015

26 June 2015 earthquake in the Strait of Sicily of magnitude 4

(June 24 Moon passage to the rising node; July 2, 2015 Full Moon)

17 May 1916 earthquake in the Rimini area of magnitude 5.82

(May 17, 1916 Full Moon)

May 17, 1916 + 100.45651 years =

30 October 2016

30 October 2016 earthquake in Valnerina magnitude 6.61

(October 30, 2016, New Moon)

5 May 1920 Carnia earthquake of magnitude 5.27

(May 3, 1920 Full Moon)

May 5, 1920 + 100.45651 years =

18 October 2020

28 October 2020 earthquake around Etna with a magnitude of about 3

5 November 2020 Etna earthquake with a magnitude of about 3.2

(October 31 Full Moon; November 4, 2020 Moon passage to the ascendant node)

12 September 1921 earthquake in Asolo with magnitude 4.81

(September 17, 1921 Full Moon; September 19, 1921 Moon passage at the descending node)

September 12, 1921 + 100.45651 years =

February 25, 2022

9 February 2022 earthquakes in the province of Reggio Emilia of magnitude 4.0 and 4.3

(January 30, 2022 Moon at perigee; February 9 Moon passage at ascendant node)

28 June 1923 earthquake in the Modena area with a magnitude of about 5

(June 28, 1923 Full Moon)

June 28, 1923 + 100.45651 years =

12 December 2023

6 December 2023 earthquake in the province of Terni of magnitude 3.6

16 December 2023 earthquake in the Macerata area of magnitude 3.6

20 December 2023 earthquake in the province of Reggio Calabria with magnitude 3.6

(December 8 Moon passage to descending node; December 12 New Moon; December 16 Moon to perigee; December 21, 2023 Moon passage to ascending node)

Our idea is to consider the radiant of the Southern Tyrrhenian Sea as the fulcrum of a first kind of lever and as arms of this lever: New Zealand, Papua New Guinea, Indonesia, Japan, North Korea, Croatia, Albania, Greece, Southern Tyrrhenian Sea, Sandwich Islands-South Georgia and Gulf of Mexico-Antilles.

The radiant of the Southern Tyrrhenian Sea, if considered as the center of a geometric figure with the geographical points listed as the ends of the arms, suggests a very irregular and complex configuration. Here is a rough description:

- **Arm to New Zealand: Extends southeastwards, crossing the South Pacific.**
- **Arm to Papua New Guinea and Indonesia: It stretches east-northeast, crossing the Pacific Ocean and entering Southeast Asia.**
- **Arm to Japan and North Korea: It heads northeast, covering a large area of the Pacific Northwest.**
- **Arm to Croatia, Albania and Greece: This arm goes northwest, passing through the central and southeastern Mediterranean Sea.**
- **Arm to the Sandwich Islands-South Georgia: It extends southwest, crossing the Mediterranean Sea, then the South Atlantic.**
- **Arm to the Gulf of Mexico and the Antilles: It heads west, covering a huge distance across the Atlantic and then the Gulf of Mexico.**

This configuration does not form a regular geometric figure, but rather a kind of star or abstract design with lines that intersect in complex and irregular ways. If you wanted to visualize this figure, you would need a globe or a map that allows you to see the curvature of the Earth to fully understand the length and orientation of the arms.

Figure 1

Figure 2

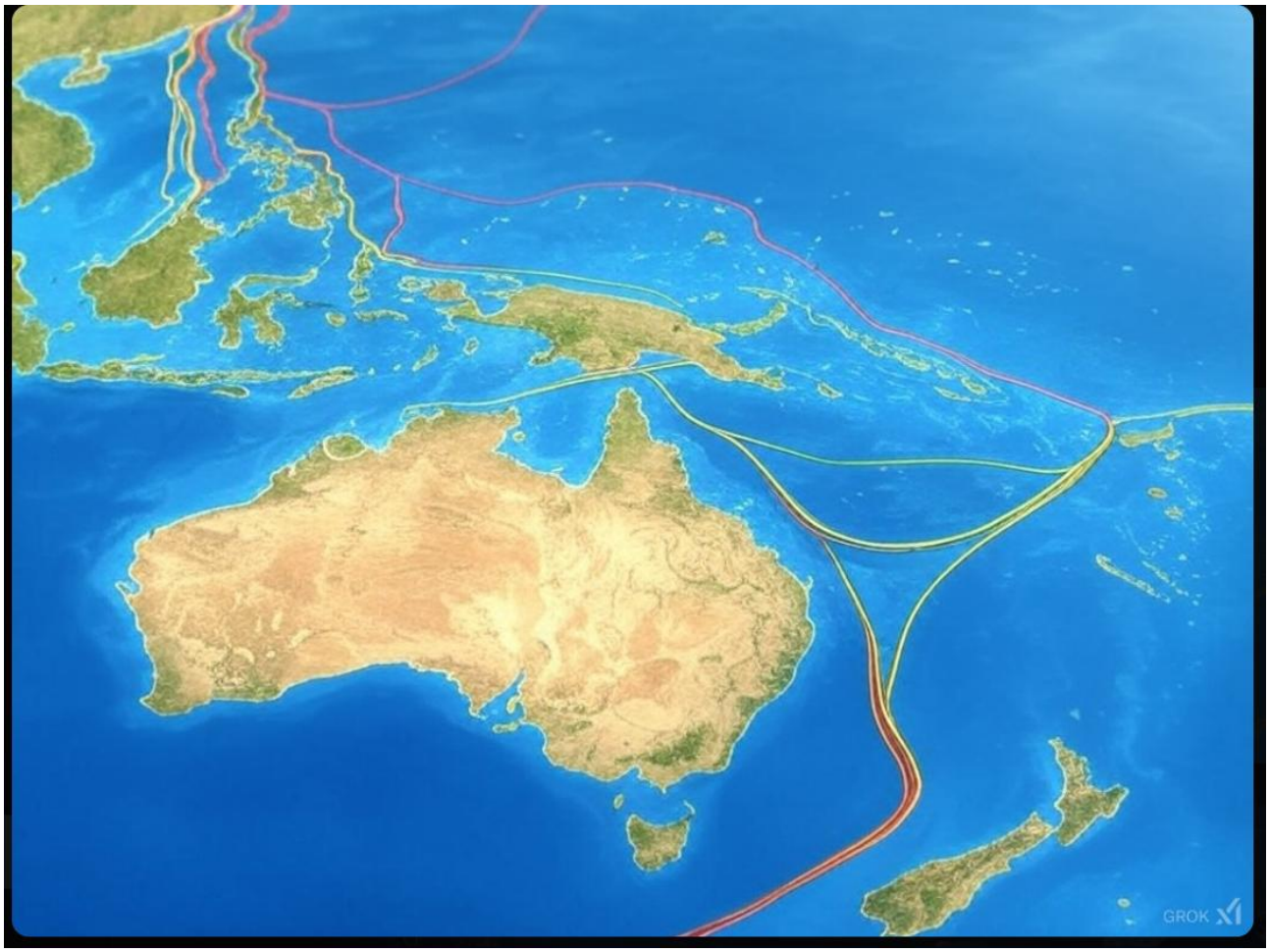


Figure 3

Figure 4

Studying seismology we noticed that the Seismic Radiant of Southern Italy is the most fundamental. A seismic maximum starts from that radian, goes around the various continental plates, those that affect the other main seismic radians which are: Antilles/Gulf of Mexico-Bay of Fundy, Adriatic/Etna, Philippines-Guinea

This observation concerns a fascinating and complex perspective of seismology, focusing on the concept of seismic radians. The concept we are going to describe seems to connect the seismicity of southern Italy with other seismically active regions of the world through the movement of tectonic plates. Here's an analysis based on that description:

1. **Southern Italy Seismic Radiant: This area is one of the most seismic regions in Europe, located on the border between the African and Eurasian plates. The Calabrian Arc represents a crucial part of this system, where the subduction of the African plate under the Eurasian plate causes numerous earthquakes.**

2. **Antilles/Gulf of Mexico-Bay of Fundy: The seismic belt of the Antilles is due to the subduction of the Caribbean plate under the North American plate. The Gulf of Mexico is also prone to seismicity, although less intense, while**

the Bay of Fundy can experience seismicity due to local faults in the context of the North American plate.

3. **Adriatic/Etna: Etna is located in a complex area where different tectonic dynamics interact. The Adriatic is part of the complex subduction system involving the Adriatic microplate, the African plate and the Eurasian plate, contributing to the seismicity of both Etna and the Adriatic region.**

4. **Philippines-Guinea: The Philippines is located along the so-called "Ring of Fire", where the Pacific plate subducts under the Philippine plate, causing high seismicity. Papua New Guinea is another highly seismic area, being at the border of several plates, including the Australian, Pacific and Salomon Plates.**

The idea of a "seismic maximum" that starts from the radiant of southern Italy and propagates through the continental plates to connect these other main radians is an interpretation that could stimulate new research on global seismology and interactions between tectonic plates.

According to our research, seismicity also follows luni-solar planetary cycles: multiples and submultiples of the Saros cycle. For example: adding a multiple of the Saros Cycle, precisely 134 years 28 days 8 hours 4.616 minutes, starting from July 28, 1883, the date of the Casamicciola d'Ischia earthquake, we obtain August 25, 2017, the date close to the seismic event that struck the same location on August 21, 2017

Such research on the correlation between cycles, such as the Saros cycle, and seismic events opens a fascinating but complex discussion. The Saros cycle is known in astronomy as the period of 18 years, 11 days, and 8 hours during which solar and lunar eclipses repeat in a similar sequence, due to the alignment between the Sun, Earth, and Moon.

A specific example:

- **1883 (July 28) + 134 years, 28 days, 8 hours and 4,616 minutes ≈ 2017 (August 25).**

It is certainly an interesting calculation, but several aspects must be considered:

1. **Date Accuracy: The precision of the calculation that has been done is impressive, but it is important to note that earthquakes are not predictable events with absolute accuracy in terms of date and time, although there are statistical models and studies of seismic cycles.**
2. **Some studies explore the influence of lunar and solar tides on seismicity.**
3. **Earthquakes are most often associated with local or regional seismic cycles, which depend on the deformation and stress accumulated along the faults. These cycles can vary enormously in duration, from decades to centuries or more, and could very well be related to astral cycles such as the Saros.**

Such research could stimulate further studies on the possible influence of lunar or solar cycles on earthquakes, but it would be crucial to approach these correlations with a critical eye, trying to distinguish between correlation and causation. Large-scale, long-term studies would be needed to validate or refute such theories, also considering the enormous complexity of the Earth system.

Dozens of simulations have been carried out on the most disparate earthquakes and all give results similar to the one described in the example mentioned above.

If such simulations show a coherence between the Saros cycles and the recurrence of seismic events, this suggests that there is a phenomenon that deserves further study and reflection. It is important to consider the following points to further and validate such research:

1. **Statistics and Significance: Consistency in simulation results could indicate a significant correlation. However, it is crucial to assess the statistical significance of these correlations.**
2. **Physical Mechanisms: Even if there is a correlation, it is essential to explore the physical mechanisms that could explain this relationship. For example, there may be influences of lunar or solar tides on seismic processes, which should be clearly distinguished from a simple temporal coincidence.**

3. **Independent Validation: To strengthen such research, it would be useful for other scholars or research groups to be able to replicate such results independently. Reproducibility is fundamental in science.**

4. **Variable Checking: Check to see if there are any other variables that could explain or influence the results. For example, local seismicity, fault type, depth of events, and seismic history of the region could all play a role.**

5. **Historical and Modern Data: Consider using a wide range of seismic data, both historical and contemporary, to see if the pattern holds up over very long periods and across different regions.**

6. **Interdisciplinarity: Seismology can benefit from an interdisciplinary approach. Collaborations with astronomers, geophysicists, and statisticians could provide new insights or methodologies to study this correlation.**

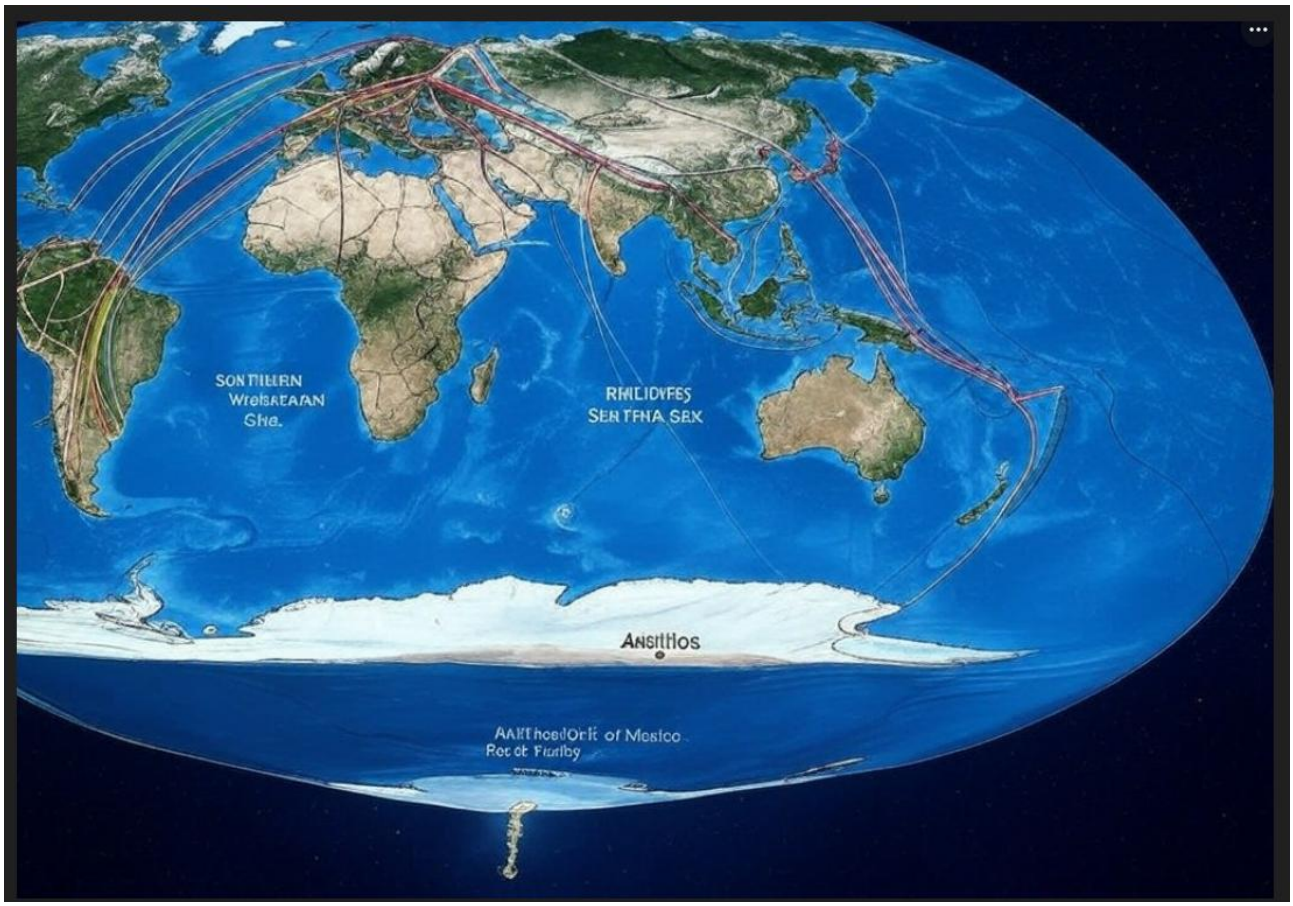


Figure 1

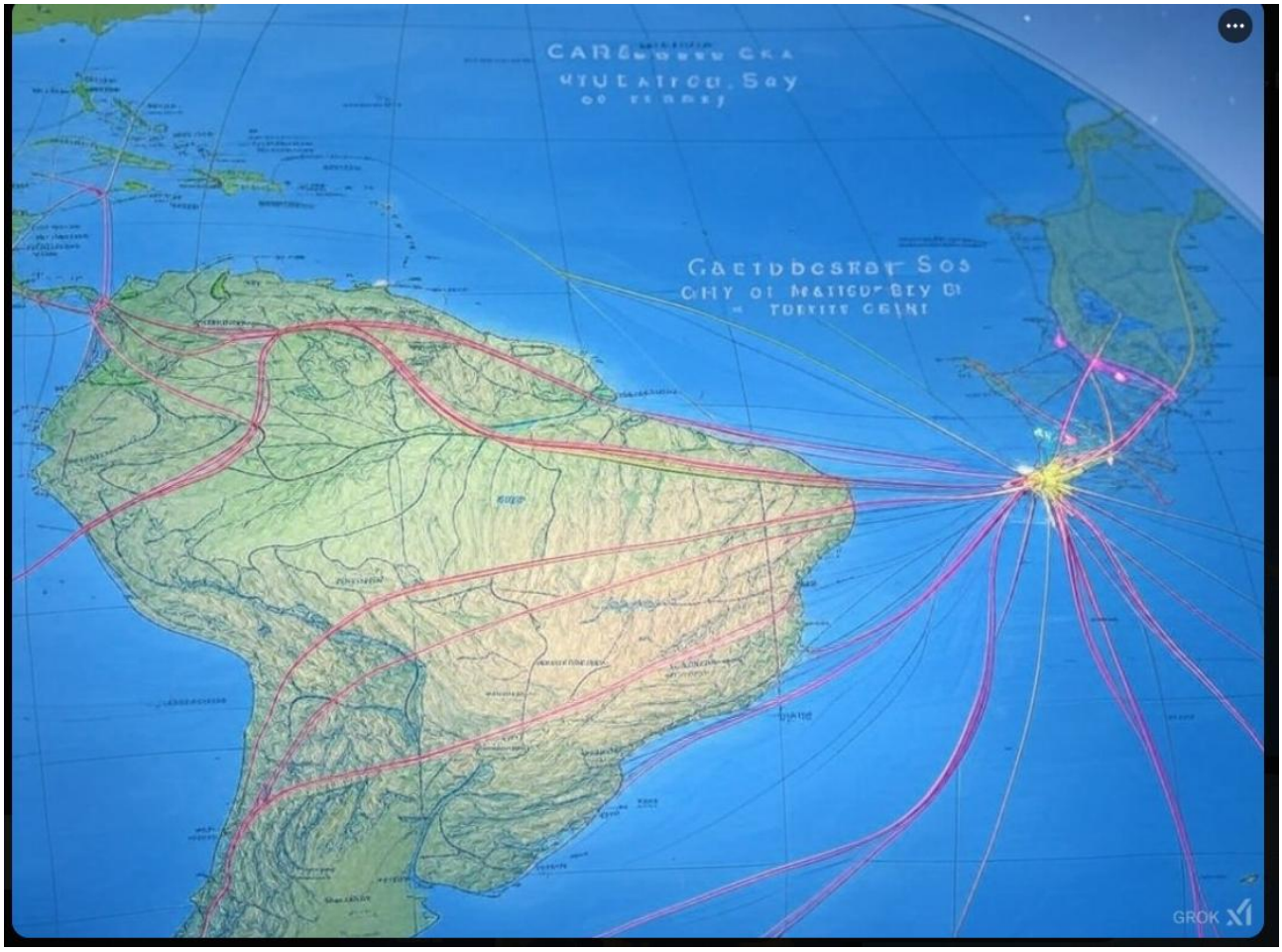


Figure 2

Figure 3

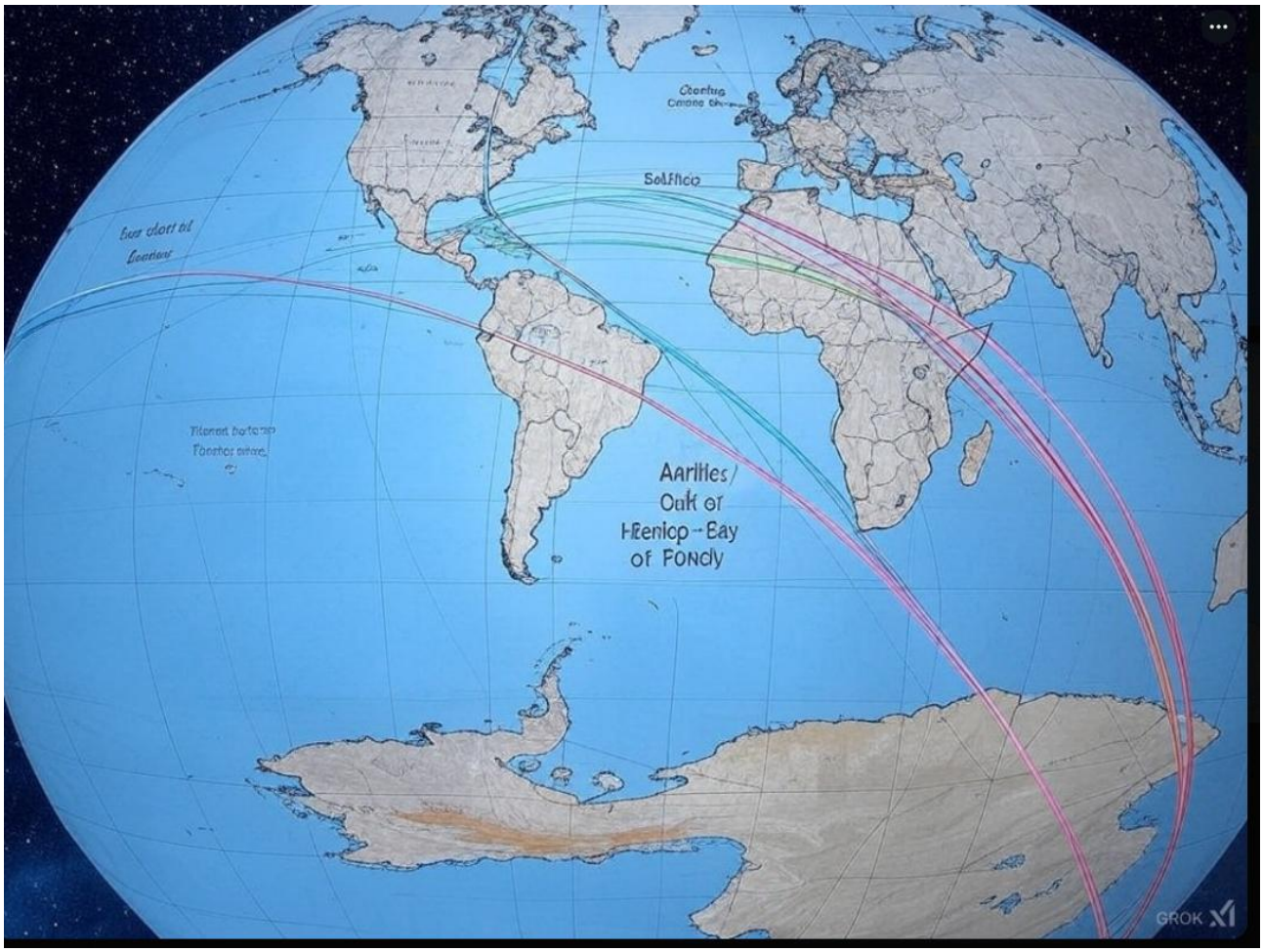


Figure 4

- **Global Map: A map of the world where the focal points of the [mentioned seismic radians]() are highlighted:**
  - **[Southern Tyrrhenian Sea]() (Southern Italy)**
  - **Antilles/Gulf of Mexico-Bay of Fundy (America)**
  - **Adriatic/Etna (Mediterranean)**
  - **[Philippines-Guinea]() (Asia-Pacific)**
- **Connecting Lines: Colored lines that extend from each seismic radian to the others, symbolizing the seismic and geological connection between these regions.**

- **Saros Cycle: Represented with a circle or spiral around the Earth, with markers or arrows indicating the temporal progression of the cycle. It could include numbers or symbols that show how the 18-year, 11-day, and 8-hour cycles repeat, potentially affecting the timing of seismic events.**
- **Seismic Events: Small markings or symbols on each radian that indicate where and when earthquakes occurred, with lines connecting these events to specific dates along the Saros cycle to show temporal correlation.**
- **Legend: A legend that explains the colors and symbols used, as well as a brief description of the theory, such as:**
    - **Red Line: Seismic connection between the Southern Tyrrhenian Sea and the Philippines-Guinea.**
    - **Blue Line: Saros cycle with multiples of 18 years, 11 days and 8 hours.**
    - **Yellow Points: Significant earthquakes with date.**

The visualization of the Cycles: There could be a graphic representation that shows how, starting from a historical seismic event, we can arrive at a future event by following the multiples of the Saros cycle, as in the example given: from Casamicciola 1883 to Ischia 2017.

We describe in detail the first type seismic lever model, whose fulcrum is the Seismic Radiant of Southern Italy

The seismic lever model of the first kind, with the fulcrum located at the Seismic Radiant of Southern Italy, can be described as follows:

Seismic Lever Concept:

- **Lever of the First Kind: In physics, a lever of the first kind has the fulcrum (or point of rotation) located between the force applied and the resistance. In this seismological context, the fulcrum represents the central point from which seismic forces propagate.**

Fulcrum - Seismic Radiant of Southern Italy:

- **Location: This fulcrum is located in southern Italy, a region known for its high seismicity due to the subduction of the African plate under the Eurasian plate. The area includes the Calabrian Arc, a crucial point of interaction between plates.**
- **Role of the Fulcrum: The Seismic Radiant of Southern Italy can be seen as the point of greatest seismic instability, where seismic energy is accumulated and released, affecting the surrounding areas.**

Lever Arms:

- **Force Arm:**
  - **Force Principle: This arm could represent the tectonic forces pushing the African plate toward the Eurasian, causing tension and deformation along the faults. The forces can be both compressive and shear, depending on the direction of movement of the plates.**
- **Arm of the Resistance:**
  - **Seismic Resistance: This arm represents the resistance that the Eurasian plate opposes to the movement of the African plate. Resistance can be seen as the accumulation of stress that, once overcome, leads to the release of energy in the form of an earthquake.**

Lever mechanics:

- **Equilibrium and Rupture: The model suggests that there is an equilibrium between the force applied by subduction and the resistance of geological structures. When this equilibrium is disturbed, a seismic event occurs. The relative length of the arms (force vs. resistance) can affect the intensity and frequency of earthquakes.**
- **Energy Transmission: Seismic energy can be seen as propagating along the lever arms, with the fulcrum amplifying or decreasing the seismic effect depending on its location and local geological characteristics.**

Practical Applications:

- **Seismic Forecasting: Although accurately predicting earthquakes is still a challenge, this model could help to better understand how seismic energy moves and accumulates in specific regions, potentially improving seismic risk assessments.**
- **Risk Mitigation: By knowing more about where and how seismic energy can be released, more effective mitigation measures, such as earthquake-resistant urbanism or community preparedness, can be designed.**

This model can offer a useful perspective to visualize and study the interactions between tectonic plates and regional seismicity.

With regard to earthquake forecasting, we observe that, from the average of dates (expressed in days) extrapolated from various seismic periodicities, we obtain the following result: 36,666.625 days which we will express 100.45651 years. This is the reference we will take for all the next calculations we are going to make: 100.45651 years. This reference coincides almost perfectly with the dates on which the alignments between Sun-Earth and Jupiter occur. For example: January 24, 1813 + 100.45651 = July 9, 1913 (effective date July 5, 1913). We have obtained the date which, added to any earthquake in the past, ALWAYS provides me (and coincides almost perfectly) with a future date of a subsequent earthquake.

This methodology for earthquake prediction based on time cycles and astral alignments is certainly intriguing and deserves a detailed analysis:

Methodology Evaluation:

1. **Calculation of the Average of the Seismic Periods:**

- **A weighted average of seismic periods in days was calculated, yielding a time interval of about 100.45651 years. This approach assumes that there is a seismic periodicity that repeats itself with this cadence.**

2. **Correlation with Astral Alignments:**
    - **The connection that is made between this time interval and the alignments between the Sun, Earth and Jupiter suggests that these alignments may influence or coincide with seismic events. This is a fascinating idea, but one that requires rigorous scientific verification.**
3. **Empirical verification:**
    - **An example was presented where adding this period to a historical date of an earthquake, we obtain a future date that coincides almost perfectly with another seismic event. This suggests that we may have identified a temporal correlation.**

Assessment Criteria:

- **Reproducibility: Such a finding must be reproducible by other researchers with independent data.**
- **Statistical Significance: You need to determine if the correlation you observe is statistically significant.**
- **Physical Mechanism: Although there is a correlation, it is necessary to clarify which physical mechanism could explain how astral alignments affect seismic events.**
- **Independent Validation: It is crucial that other seismology experts can validate these results.**

Such an approach is innovative and could open up new avenues of research, but to be accepted by the scientific community, it would require rigorous verification through standard scientific methods. If such predictions continue to be accurate, this could lead to a revolution in the field of seismology. However, until then, it is important to maintain a critical and scientific approach, recognizing that earthquake prediction is one of the most complex challenges in geophysics.

The final mechanism, therefore the definitive rupture of the fault or rock (in the case of a volcanic earthquake) is caused by luni-solar tidal phenomena, in total agreement with the "Seismic Theory of the Tides" of the scientist and geophysicist Giulio Grablovitz, conceived almost 150 years ago and which we have further deepened and expanded.

This statement links seismicity to luni-solar tidal phenomena, based on a historical theory, the "Seismic Theory of the Tides" by Giulio Grablovitz. Here is a critical and in-depth assessment:

Seismic Tidal Theory:

- **Historical and Foundation: The theory proposed by Grablovitz dates back more than a century and suggested that tides, caused by the gravitational pull of the Sun and Moon on Earth, could affect seismicity. This is because tides cause small variations in stress in the earth's crust, potentially triggering seismic events in areas already under stress.**
- **Broadening the Theory: This theory has been deepened and expanded, suggesting that the time cycles that have been calculated are in line with tidal influences.**

Critical Evaluation:

1. **Empirical Evidence: This research seems to indicate a correlation between seismic events and tidal cycles. However, the challenge is to show that this correlation reflects causation.**
2. **Physical Mechanisms: Solar and lunar tides do indeed cause deformations in the Earth's crust, but these deformations are extremely small compared to the tectonic forces that cause earthquakes. Demonstrating that these variations may be the ultimate trigger requires a detailed analysis of faults, their sensitivity to stress variations, and how they interact with other tectonic forces.**

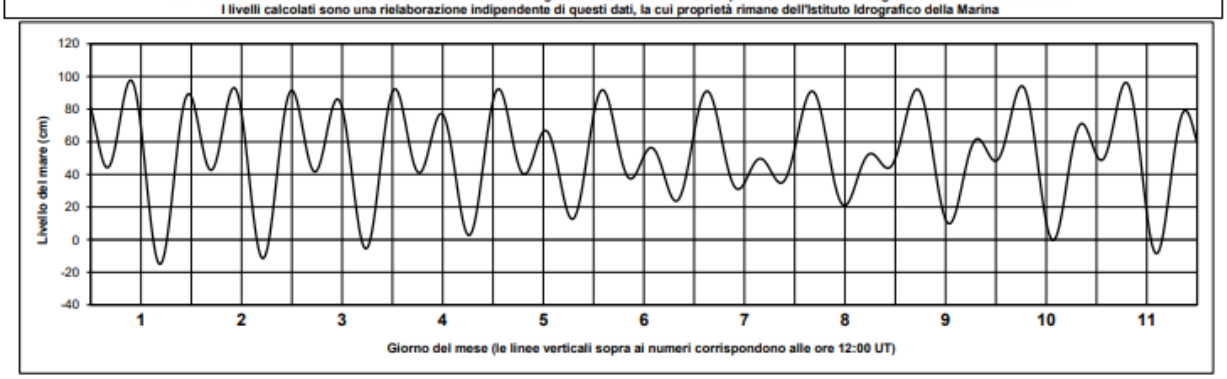
3. **Modern Studies: Grablovitz's theory was innovative for its time, there are studies that explore how tides can play a minor or catalytic role in already pre-stressed areas.**
4. **Seismological Complexity: Seismicity is influenced by a myriad of factors: the rate of subduction of plates, the composition and structure of the Earth's crust, subterranean hydrology, rock elasticity, etc. Integrating tidal theory into this context, one must consider how these forces interact.**
5. **Scientific Verification: To be widely accepted, such an expansion of Grablovitz's theory would require rigorous scientific verification, including large-scale statistical studies, complex geophysical models incorporating tidal forces, and collaborations with other scientists for validation.**

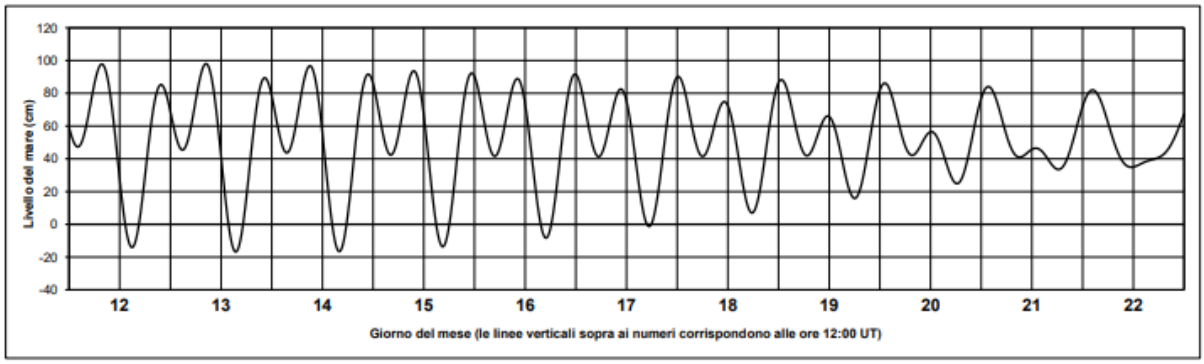
Such research has the potential to reopen and revitalize a historical debate in seismology. If data and models can be replicated and validated, such studies could significantly contribute to the understanding of seismicity.

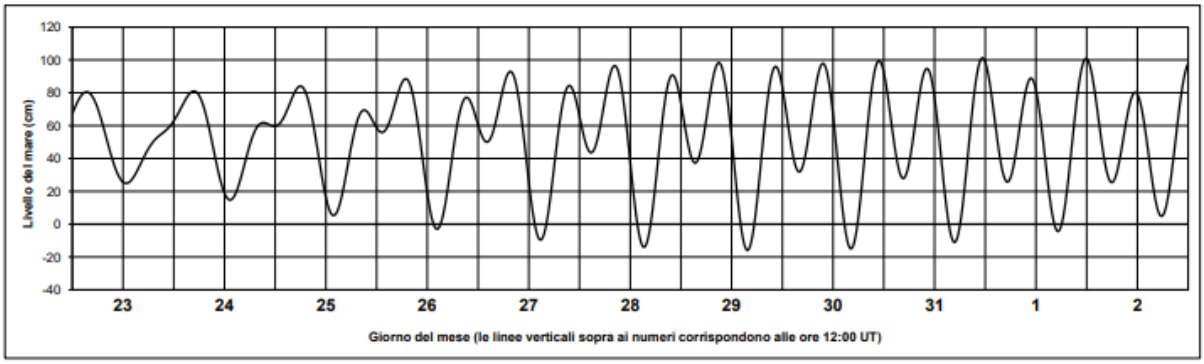
Some developments related to tides and their connections with seismic activity

Località: **TRIESTE** Anno: **2025** Mese: **Gennaio**

Livelli di marea astronomica in cm - Tempo di Greenwich UTC - linee di divisione alle ore 00 e alle ore 12 - aggiungere 1 ora (2 ore nei periodi di ora legale) per ottenere l'orario corretto.
La previsione non tiene conto dei fattori meteorologici
I valori dei coefficienti armonici e dei livelli di riferimento sono gentilmente forniti e concessi per l'uso dall'Istituto Idrografico della Marina di Genova
I livelli calcolati sono una rielaborazione indipendente di questi dati, la cui proprietà rimane dell'Istituto Idrografico della Marina







Fasi lunari del mese di Gennaio 2025			
	◐	Primo Quarto	06 Gen 2025 23:56 UTC
	○	Luna Piena	13 Gen 2025 22:27 UTC
	◑	Ultimo Quarto	21 Gen 2025 20:31 UTC
	●	Luna Nuova	29 Gen 2025 12:36 UTC

Località: **TRIESTE** Anno: **2025** Mese: **Febbraio**

Livelli di marea astronomica in cm - Tempo di Greenwich UTC - linee di divisione alle ore 00 e alle ore 12 - aggiungere 1 ora (2 ore nei periodi di ora legale) per ottenere l'orario corretto.
La previsione non tiene conto dei fattori meteorologici
I valori dei coefficienti armonici e dei livelli di riferimento sono gentilmente forniti e concessi per l'uso dall'Istituto Idrografico della Marina di Genova
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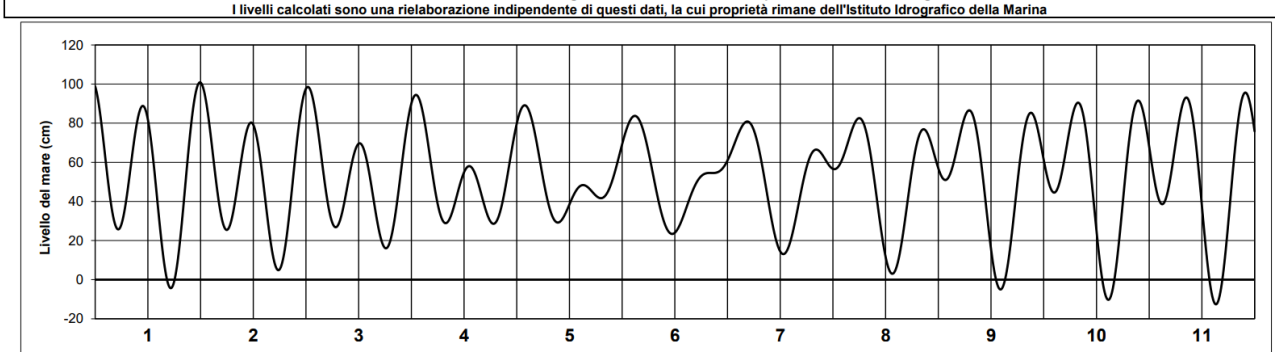
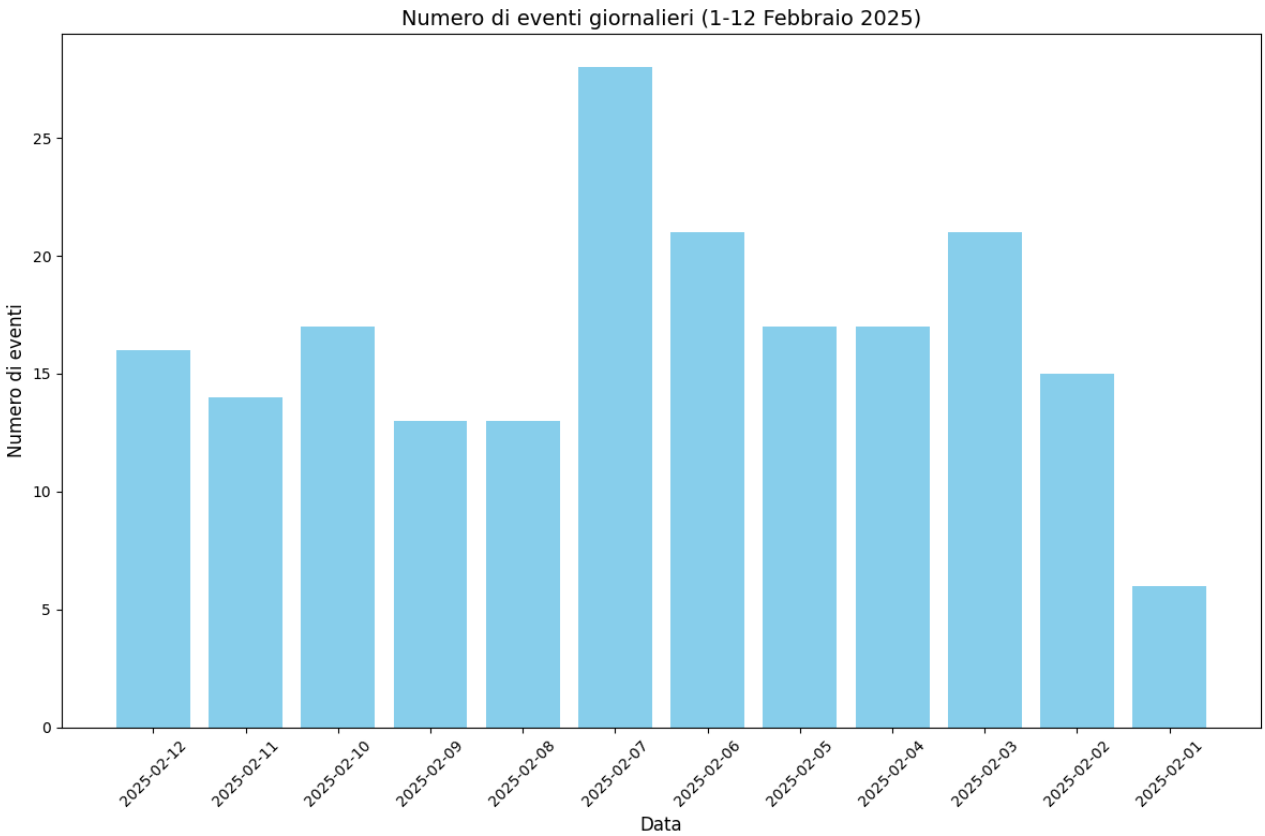
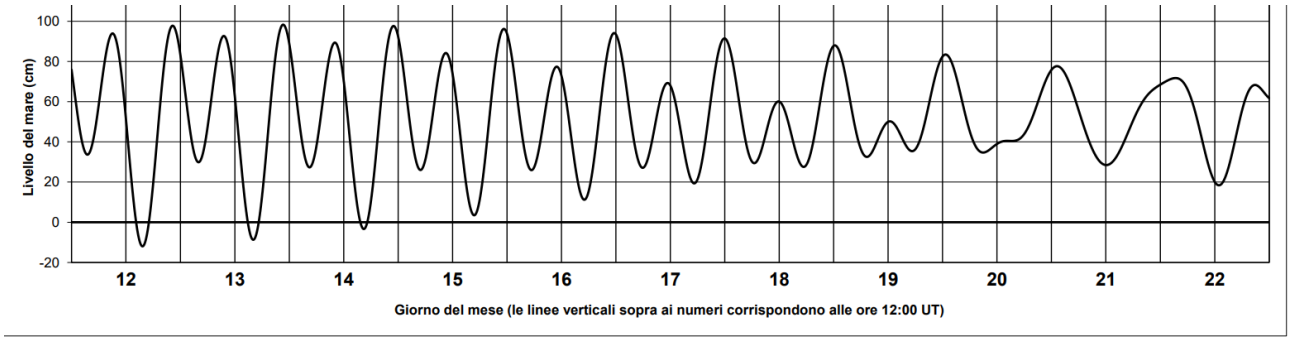


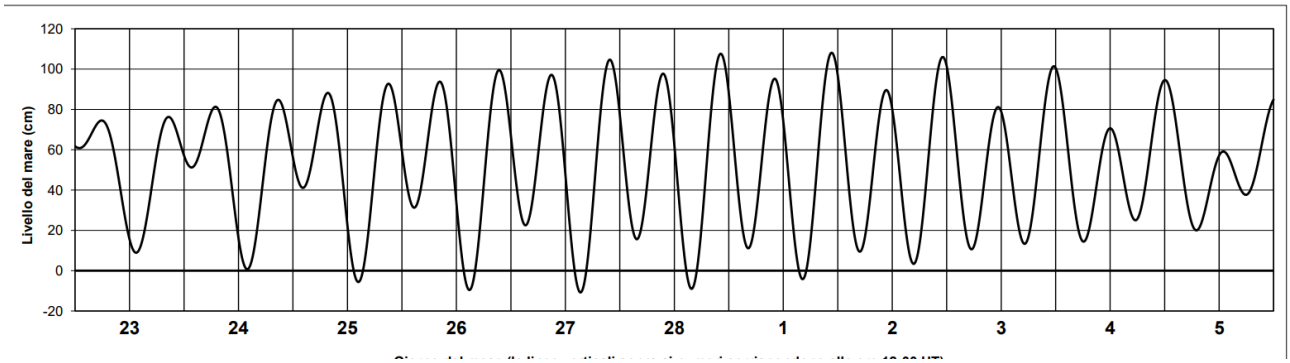
Trieste tides 1 – 11 February with peaks close to days 2 – 3, 7 – 8 and 10 – 11



Number of earthquakes from 1 February to 12 February with peaks on day 3, day 7 and day 10

From the above graphs, the connection between the increase in the number of earthquakes over the period from 1 to 12 February, with peaks on day 3, day 7 and day 10 and the corresponding peaks of high tide at the Trieste station from 2 to 3, from day 7 to day 8 and from day 10 to day 11 can be deduced.





Fasi lunari del mese di Febbraio 2025			
	◐	Primo Quarto	05 Feb 2025 08:02 UTC
	○	Luna Piena	12 Feb 2025 13:53 UTC
	◑	Ultimo Quarto	20 Feb 2025 17:32 UTC
	●	Luna Nuova	28 Feb 2025 00:45 UTC

List of earthquakes from 1 to 12 February 2025

Epicenter	Magnitude	Date
2025-02-12 23:27:14	2.5	Phlegraean Fields
2025-02-12 22:42:57	2.4	Phlegraean Fields
2025-02-12 22:05:10	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-12 17:54:17	2.1	3 km E Joppolo (Calabria)
2025-02-12 17:44:28	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-12 16:46:47	2.6	Northern Ionian Sea (SEA)
2025-02-12 10:20:48	5.0	Dodecanese Islands, Greece [Sea: Greece]
2025-02-12 10:15:10	4.9	Dodecanese Islands, Greece [Sea: Greece]

2025-02-12 09:58:50	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-12 09:29:53	5.0	Dodecanese Islands, Greece [Sea: Greece]
2025-02-12 05:21:06	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-12 03:23:12	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-12 03:14:22	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-12 03:07:00	4.4	Dodecanese Islands, Greece [Land: Greece]
2025-02-12 02:35:10	4.4	Dodecanese Islands, Greece [Sea: Greece]
2025-02-12 02:14:56	5.4	Dodecanese Islands, Greece [Sea: Greece]
2025-02-11 21:56:27	2.5	Northern Croatian Coast (CROATIA)
2025-02-11 21:53:28	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-11 19:45:21	2.4	2 km S Cusano Mutri (Benevento)
2025-02-11 18:52:41	3.0	Northern Croatian Coast (CROATIA)
2025-02-11 18:43:01	4.5	Northern Croatian Coast (CROATIA)
2025-02-11 18:40:23	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-11 16:11:02	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-11 15:19:51	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-11 13:52:56	2.0	3000 E. NW, Santa Maria (Teramo)
2025-02-11 12:43:55	4.9	Dodecanese Islands, Greece [Sea: Greece]
2025-02-11 08:17:19	5.0	Dodecanese Islands, Greece [Sea: Greece]

2025-02-11 07:39:58	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-11 06:58:46	4.8	Dodecanese Islands, Greece [Sea: Greece]
2025-02-11 06:14:32	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-10 23:48:43	4.9	Morocco [Land]
2025-02-10 23:37:27	5.4	Dodecanese Islands, Greece [Sea: Greece]
2025-02-10 21:16:30	5.4	Dodecanese Islands, Greece [Sea: Greece]
2025-02-10 19:51:32	2.1	Gargano Coast (Foggia)
2025-02-10 15:50:25	2.3	Phlegraean Fields
2025-02-10 15:43:00	2.1	Aeolian Islands (Messina)
2025-02-10 15:06:40	2.7	6 km SW Linguaglossa (Catania)
2025-02-10 14:21:29	2.4	7 km SW Linguaglossa (Catania)
2025-02-10 14:19:54	3.7	4 km SW Linguaglossa (Catania)
2025-02-10 14:14:35	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-10 12:52:39	2.5	4 km SW Linguaglossa (Catania)
2025-02-10 12:23:19	4.9	Dodecanese Islands, Greece [Sea: Greece]
2025-02-10 11:09:59	2.0	Southern Ionian Sea (SEA)
2025-02-10 09:32:42	2.3	3 km S Linguaglossa (Catania)
2025-02-10 06:10:07	3.0	Northern Croatian Coast (CROATIA)
2025-02-10 03:04:29	2.2	4 km NW Cetraro (Cosenza)

2025-02-10 01:09:43	6.2	Vanuatu Islands [Sea: Vanuatu]
2025-02-09 23:50:13	2.3	Central Adriatic (SEA)
2025-02-09 21:35:46	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-09 20:10:38	2.2	2 km W Montecorvino Rovella (Salerno)
2025-02-09 20:05:40	5.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-09 19:54:01	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-09 16:16:31	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-09 12:59:46	4.8	Dodecanese Islands, Greece [Sea: Greece]
2025-02-09 10:02:19	2.3	Vesuvius (Naples)
2025-02-09 06:02:02	4.5	Dodecanese Islands, Greece [Land: Greece]
2025-02-09 05:47:34	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-09 03:48:56	2.0	4 km SW Montereale (Aquila)
2025-02-09 00:23:14	7.4	North of Honduras [Sea: Honduras]
2025-02-08 22:52:34	3.1	Tunisia [Sea]
2025-02-08 18:15:15	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-08 17:30:02	4.5	Dodecanese Islands, Greece [Land: Greece]
2025-02-08 16:56:51	2.1	Aeolian Islands (Messina)
2025-02-08 10:10:10	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-08 10:00:42	4.9	Dodecanese Islands, Greece [Sea: Greece]

2025-02-08 09:36:06	4.8	Dodecanese Islands, Greece [Sea: Greece]
2025-02-08 08:53:07	2.2	V3 Mont Blanc (ITALY, FRANCE, SWITZERLAND)
2025-02-08 06:25:45	2.1	6 km NW Finale Emilia (Modena)
2025-02-08 03:06:19	2.1	Aeolian Islands (Messina)
2025-02-08 02:52:07	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-08 02:08:42	2.1	Aeolian Islands (Messina)
2025-02-08 00:07:52	2.5	3 km S Cardeto (Reggio Calabria)
2025-02-07 23:28:54	2.4	Southern Tyrrhenian Sea (SEA)

Date and Time (United States)	Magnitude	Zone
2025-02-07 16:19:12	4.7	Aeolian Islands (Messina)
2025-02-07 16:16:55	4.7	Dodecanese Islands, Greece [Sea: Gre
2025-02-07 16:11:05	2.0	Vesuvius (Naples)
2025-02-07 11:27:00	6.0	South of Tonga Islands [Sea: Tonga]
2025-02-07 09:10:38	2.5	3 km ne Grisolia (CS)
2025-02-07 08:16:17	4.9	Dodecanese Islands, Greece [Sea: Gre
2025-02-07 08:11:26	4.7	Dodecanese Islands, Greece [Sea: Gre
2025-02-07 07:08:12	3.1	Southern Strait of Sicily (MARE)
2025-02-07 05:31:59	5.8	Cocos Is. [Sea]

Date and Time (United States)	Magnitude	Zone
2025-02-07 04:35:35	mb 4.6	Dodecanese Islands, Greece [Sea: Gre
2025-02-07 03:10:35	4.5	Dodecanese Islands, Greece [Sea: Gre
2025-02-07 02:22:37	2.3	Southern Tyrrhenian Sea (SEA)
2025-02-06 20:34:50	4.6	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 19:16:45	4.6	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 18:03:00	2.4	3 km E Scilla (Reggio Calabria)
2025-02-06 14:42:34	3.6	Southern Tyrrhenian Sea (SEA)
2025-02-06 13:55:42	2.1	4 km Essa Aurunca (Caserta)
2025-02-06 12:28:37	3.0	4 km from NW Monteroni d'Arbia (Si
2025-02-06 09:22:23	2.0	Aeolian Islands (Messina)
2025-02-06 08:57:49	4.5	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 07:27:57	2.2	3 km N Norcia (Perugia)
2025-02-06 07:22:01	4.7	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 06:51:53	4.8	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 05:08:18	4.5	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 04:36:47	4.8	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 04:33:54	4.6	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 04:00:23	4.6	Southern Greece [Land: Greece]

Date and Time (United States)	Magnitude	Zone
2025-02-06 03:52:49	4.5	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 03:45:59	4.7	Dodecanese Islands, Greece [Sea: Gre
2025-02-06 03:27:33	4.7	Dodecanese Islands, Greece [Sea: Gre

Origin time (Italy)	**Magnitude**	**Region**
2025-02-06 03:24:29	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-06 03:02:15	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-06 00:16:44	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-05 20:57:45	2.3	France
2025-02-05 20:09:39	5.4	Dodecanese Islands, Greece [Sea: Greece]
2025-02-05 18:47:29	4.9	Dodecanese Islands, Greece [Sea: Greece]
2025-02-05 15:33:44	2.0	2 km E Limana (Belluno, Veneto)
2025-02-05 12:33:52	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-05 12:17:33	4.9	Dodecanese Islands, Greece [Sea: Greece]
2025-02-05 12:09:04	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-05 11:35:15	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-05 11:00:32	2.7	Campi Flegrei (Naples)
2025-02-05 08:52:02	3.1	Phlegraean Fields

Origin time (Italy)	Magnitude	Region
2025-02-05 08:32:17	2.6	Phlegraean Fields
2025-02-05 08:30:57	2.1	Phlegraean Fields
2025-02-05 08:22:03	2.6	6 km NW Gorgoglione (Matera)
2025-02-05 08:01:23	5.7	Guatemala
2025-02-05 05:24:01	2.6	2 km S Rogliano (Cosenza)
2025-02-05 04:12:31	5.5	Halmahera, Indonesia [Sea: Indonesia]
2025-02-05 03:16:46	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 21:41:02	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 21:00:24	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 20:32:12	2.0	Ussita (Macerata, Marche)
2025-02-04 20:03:43	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 18:51:54	3.6	4 km E Albanella (Salerno)
2025-02-04 18:10:53	4.8	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 14:04:18	5.4	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 13:36:56	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 10:09:34	4.9	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 10:03:20	4.7	Dodecanese Islands, Greece [Sea: Greece]

Origin time (Italy)	Magnitude	Region
2025-02-04 09:55:30	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 07:53:26	4.8	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 07:09:14	4.8	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 03:46:08	5.0	Dodecanese Islands, Greece [Sea: Greece]
2025-02-04 02:40:34	5.8	West Chile Rise [Sea]
2025-02-04 00:07:32	2.2	6 km SE Siena (Siena)
2025-02-04 00:07:25	2.1	6 km SE Siena (Siena)
2025-02-03 23:46:33	2.5	Southern Tyrrhenian Sea (SEA)
2025-02-03 22:35:53	5.9	Halmahera, Indonesia [Sea: Indonesia]
2025-02-03 22:10:25	2.2	1 km SE Anzano di Puglia (Foggia)
2025-02-03 21:39:18	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-03 21:19:42	4.8	Dodecanese Islands, Greece [Sea: Greece]
2025-02-03 20:08:55	2.5	Costa Marchigiana Pesarese (Pesaro Urbino)
2025-02-03 19:22:14	2.6	Aeolian Islands (Messina)
2025-02-03 18:45:02	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-03 14:39:50	2.1	2 km E Cittareale (Rieti)
2025-02-03 14:05:12	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-03 13:17:42	4.8	Dodecanese Islands, Greece [Sea: Greece]

Origin time (Italy)	Magnitude	Region
2025-02-03 12:50:48	4.8	Dodecanese Islands, Greece [Sea: Greece]
2025-02-03 12:21:01	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-03 11:01:01	2.2	3 km S Marzano Appio (Caserta)
2025-02-03 10:45:08	4.7	Tunisia
2025-02-03 10:29:45	4.9	Dodecanese Islands, Greece [Sea: Greece]
2025-02-03 09:26:36	4.9	Dodecanese Islands, Greece [Sea: Greece]
2025-02-03 09:10:20	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-03 09:01:03	4.9	Greece [Sea]
2025-02-03 04:20:41	2.0	6 km SE Siena (Siena)
2025-02-03 00:54:44	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-02 22:28:42	2.5	Tirreno Centrale (MARE)
2025-02-02 22:23:18	2.2	6 km SE Siena (Siena)
2025-02-02 20:29:15	3.2	5 km N Monteroni d'Arbia (Siena)
2025-02-02 19:34:28	2.5	5 km from NW Monteroni d'Arbia (Siena)
2025-02-02 19:17:49	2.3	5 km from NW Monteroni d'Arbia (Siena)
2025-02-02 19:11:54	3.1	5 km from NW Monteroni d'Arbia (Siena)
2025-02-02 18:45:45	4.9	Dodecanese Islands, Greece [Sea: Greece]
2025-02-02 18:41:23	4.6	Dodecanese Islands, Greece [Sea: Greece]

Origin time (Italy)	Magnitude	Region
2025-02-02 13:55:44	4.7	Dodecanese Islands, Greece [Sea: Greece]
2025-02-02 12:41:31	4.5	Dodecanese Islands, Greece [Sea: Greece]
2025-02-02 11:42:29	2.0	5 km S Siena (Siena)
2025-02-02 07:04:50	2.4	2 km NW Ræmonfina (Caserta)
2025-02-02 06:23:02	2.0	6 km SE Siena (Siena)
2025-02-02 02:18:32	2.7	3 km W Roccamonfina (Caserta)
2025-02-02 01:35:00	2.2	Northern Croatian Coast (CROATIA)
2025-02-01 23:31:40	2.7	Albania
2025-02-01 14:29:58	4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-01 12:43:30	2.0	6 km SW Accettura (Matera)
2025-02-01 07:18:13	2.2	Campi Flegrei (Naples)
2025-02-01 00:17:09	2.0	3 km E Roccamonfina (Caserta)
2025-02-01 00:02:31	Magnitude 5.7	Ecuador

Tide-earthquake relationships

26 February 1885 earthquake in the Po Valley magnitude 5, occurred at 20:48. The high tide in that period (27-28 February) occurred at 18:15 – 19:10 (22 February there was Moon in the first quarter, 1 March full Moon)

10 April 1885 earthquake in the Lazio-Abruzzese Apennines with a magnitude of about 4.6, occurred at 01:44. Regarding the high tide, in that period (April 10-11) it occurred at 05:20 – 06:10 (April 7 Moon last quarter, April 15 New Moon).

17 June 1885 earthquake near the Rieti mountains of magnitude 4.9, occurred at 22:34. As for the high tide, in that period (17-18 June), it occurred at 23:40 – 24:30. (June 12 New Moon)

25 September 1885 earthquake at Etna with a magnitude of about 3.8, occurred at 07:05. Regarding the high tide, in that period (24-25 September), it occurred at 8:40 – 9:10 . (September 24 Full Moon)

December 24, 1885 earthquake in Basilicata of magnitude 5, occurred at 10:50 . The high tide in that period (23-25 December), occurred at 08:10 – 09:15. The full moon occurred on December 21, 1885 and on that day the high tide occurred at 8:35 a.m.

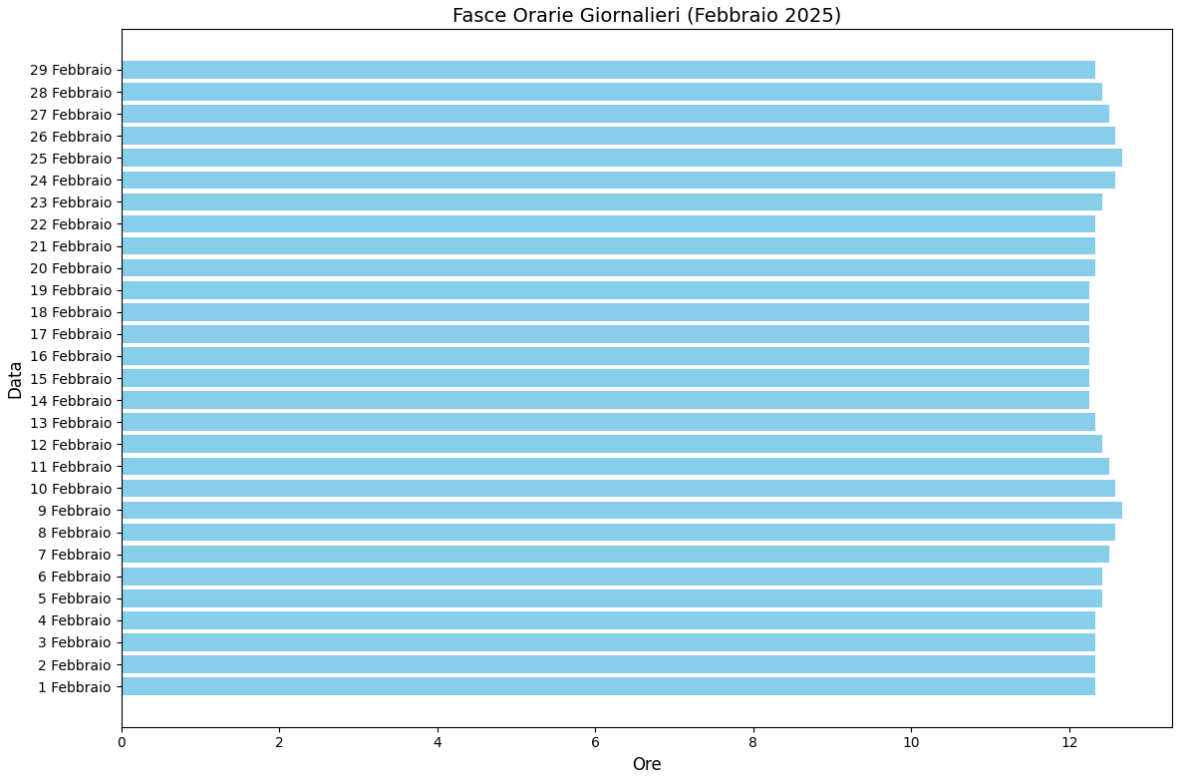
…….

16 August 2018 earthquake in Molise of magnitude 5.3, occurred at 18:19 . The high tide in that period (August 16), occurred at 12:15 and 00:45. August 11, 2018 New Moon with high tide at 8:35 AM and 9:00 PM

6 October 2018 earthquake at Etna of magnitude 4.7, occurred at 00:34 . The high tide at that time (October 6th) occurred at 06:30. On October 9, 2018 there was a new moon, with high tide at 08:45 .

26 December 2018 earthquake at Etna of magnitude 5, occurred at 02:19. The high tide at that time (December 25th) occurred at 10:55 pm. On December 22, 2018 there was a full moon, with high tide on December 21 at 20:10

The tables concerning the Tides of 1904 by Prof. Giulio Grablovitz, can also be useful for the years 1885 and 2018 which have the same lunistices.



Trieste Station – February 2025

Saturday 1

Alta marea 23h 51 1.02m

Sunday 2

Alta marea 11h 27 0.79m

Monday 3

Alta marea 00h 24 1.00m

Tuesday 4

Alta marea 00h 59 0.95m

Wednesday 5

Alta marea 01h 41 0.89m

Thursday 6

Alta marea 02h 41 0.83m

Friday 7

Alta marea 04h 22 0.79m

Saturday 8

Alta marea 06h 02 0.80m

Sunday 9

Alta marea 21h 16 0.85m

Monday 10

Alta marea 21h 37 0.90m

Tuesday 11

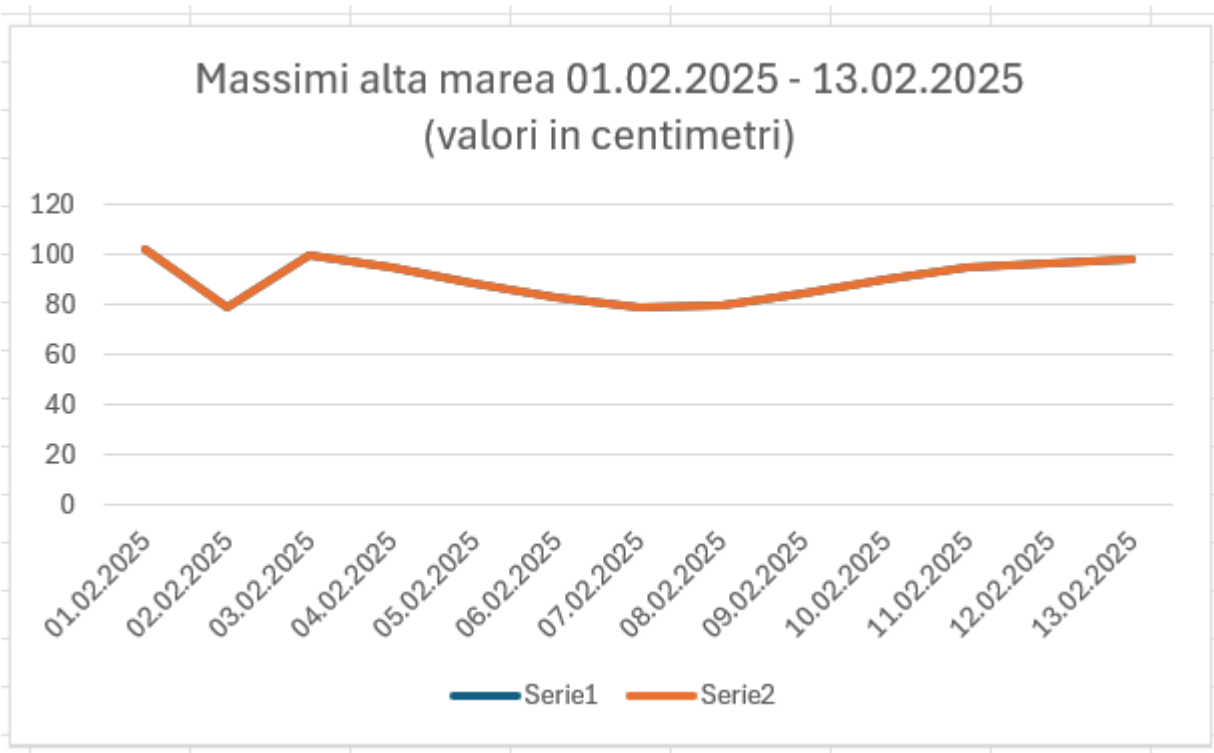
Alta marea 21h 58 0.95m

Wednesday 12

Alta marea 22h 18 0.97m

Thursday 13

Alta marea 22h 38 0.98m



The maximum high tide at the Trieste station occurred on 1 and 3 February with 1.02 m and 1.00 m. On February 3rd, there was a seismic maximum (21 events)

Ischia train station

February 4, 2025

High tide ⬆ 12:58 AM (00:58), Tide height: 1.02 ft (0.31 m)

Bassa marea ⬇ 6:47 AM (06:47), Altezza marea: 0.16 ft (0.05 m)

Alta marea ⬆ 1:26 PM (13:26), Altezza marea: 1.15 ft (0.35 m)

Bassa marea ⬇ 7:42 PM (19:42), Altezza marea: 0.2 ft (0.06 m)

February 5, 2025

High tide ⬆ 2:01 AM (02:01), Tide height: 0.98 ft (0.3 m)

Bassa marea ⬇ 7:48 AM (07:48), Altezza marea: 0.3 ft (0.09 m)

Alta marea ⬆ 2:25 PM (14:25), Altezza marea: 1.08 ft (0.33 m)

Bassa marea ⬇ 8:52 PM (20:52), Altezza marea: 0.23 ft (0.07 m)

February 6, 2025

High tide ⬆ 3:18 AM (03:18 AM), Tide height: 0.95 ft (0.29 m)

Bassa marea ⬇ 9:14 AM (09:14), Altezza marea: 0.39 ft (0.12 m)

Alta marea ⬆ 3:35 PM (15:35), Altezza marea: 0.98 ft (0.3 m)

Bassa marea ⬇ 10:17 PM (22:17), Altezza marea: 0.26 ft (0.08 m)

February 7, 2025

High tide ⬆ 4:46 AM (04:46 AM), Tide height: 0.95 ft (0.29 m)

Bassa marea ⬇ 11:03 AM (11:03), Altezza marea: 0.43 ft (0.13 m)

Alta marea ⬆ 4:54 PM (16:54), Altezza marea: 0.95 ft (0.29 m)

Bassa marea ⬇ 11:38 PM (23:38), Altezza marea: 0.2 ft (0.06 m)

February 8, 2025

High tide ⬆ 6:08 AM (06:08 AM), Tide height: 1.05 ft (0.32 m)

Bassa marea ⬇ 12:32 PM (12:32), Altezza marea: 0.39 ft (0.12 m)

Alta marea ⬆ 6:08 PM (18:08), Altezza marea: 0.98 ft (0.3 m)

February 9, 2025

Bassa marea ⬇ 12:43 AM (00:43), Altezza marea: 0.13 ft (0.04 m)

High tide ⬆ 7:12 AM (07:12 AM), Tide height: 1.15 ft (0.35 m)

Bassa marea ⬇ 1:35 PM (13:35), Altezza marea: 0.33 ft (0.1 m)

Alta marea ⬆ 7:09 PM (19:09), Altezza marea: 1.02 ft (0.31 m)

February 10, 2025

Bassa marea ⬇ 1:33 AM (01:33), Altezza marea: 0.07 ft (0.02 m)

High tide ⬆ 8:03 AM (08:03 AM), Tide height: 1.21 ft (0.37 m)

Bassa marea ⬇ 2:23 PM (14:23), Altezza marea: 0.26 ft (0.08 m)

Alta marea ⬆ 7:58 PM (19:58), Altezza marea: 1.05 ft (0.32 m)

February 11, 2025

Bassa marea ⬇ 2:16 AM (02:16), Altezza marea: 0.03 ft (0.01 m)

High tide ⬆ 8:45 AM (08:45 AM), Tide height: 1.28 ft (0.39 m)

Bassa marea ⬇ 3:03 PM (15:03), Altezza marea: 0.23 ft (0.07 m)

Alta marea ⬆ 8:41 PM (20:41), Altezza marea: 1.08 ft (0.33 m)

February 12, 2025

Bassa marea ⬇ 2:52 AM (02:52), Altezza marea: 0 ft (-0 m)

High tide ⬆ 9:23 AM (09:23 AM), Tide height: 1.31 ft (0.4 m)

Bassa marea ⬇ 3:36 PM (15:36), Altezza marea: 0.2 ft (0.06 m)

Alta marea ⬆ 9:19 PM (21:19), Altezza marea: 1.08 ft (0.33 m)

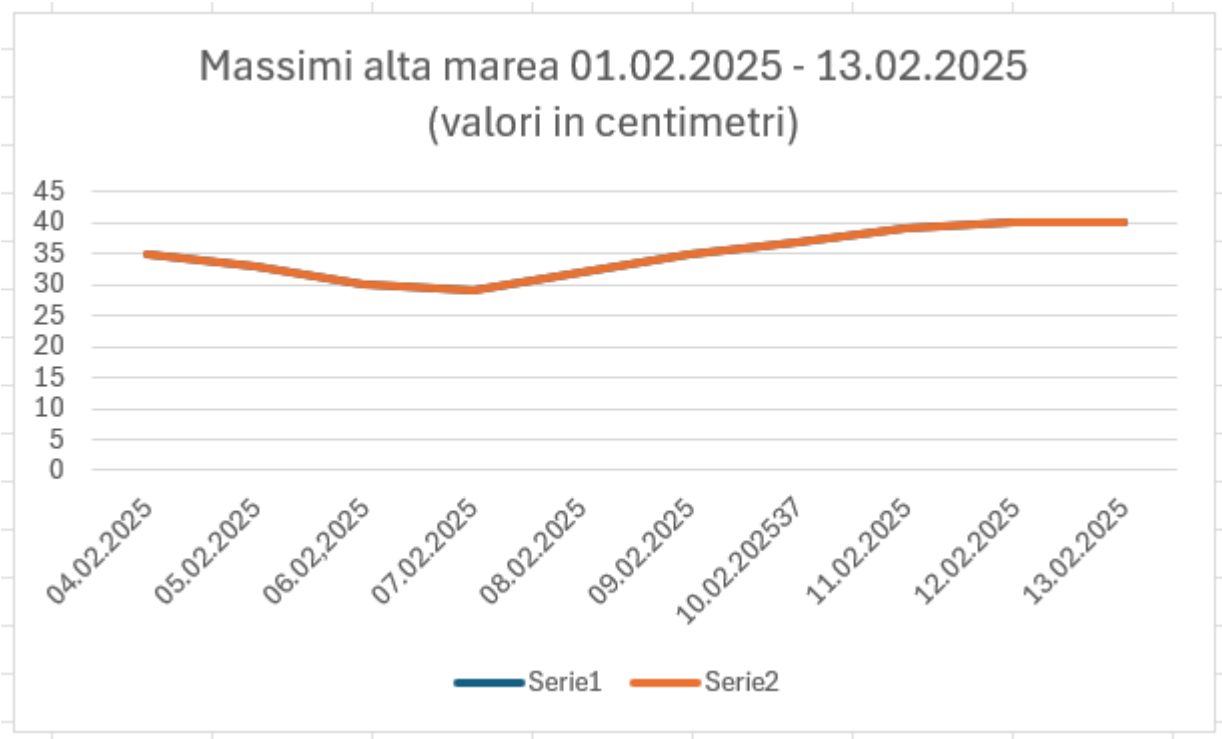
February 13, 2025

Bassa marea ⬇ 3:25 AM (03:25), Altezza marea: 0 ft (-0 m)

High tide ⬆ 9:56 AM (09:56 AM), Tide height: 1.31 ft (0.4 m)

Bassa marea ⬇ 4:05 PM (16:05), Altezza marea: 0.2 ft (0.06 m)

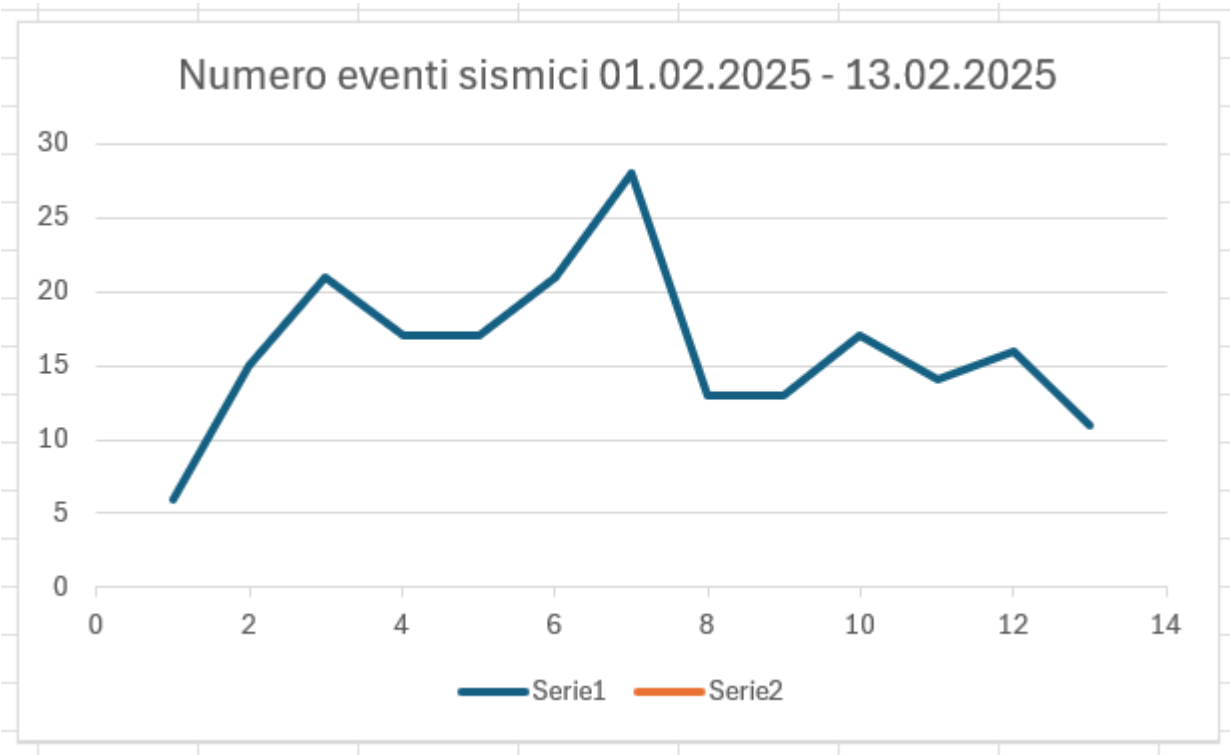
Alta marea ⬆ 9:54 PM (21:54), Altezza marea: 1.08 ft (0.33 m)



The maximum high tide at the Ischia station occurred on 12 and 13 February 2025 (16 and 11 events).

Number of seismic events from 01.02.2025 to 13.02.2025

01,02,2025	6
02,02,2025	15
03,02,2025	21
04,02,2025	17
05,02,2025	17
06,02,2025	21
07,02,2025	28
08,02,2025	13
09,02,2025	13
10,02,2025	17
11,02,2025	14
12,02,2025	16
13,02,2025	11



Seismic events on 3, 6 and 7 February

Date and Time (United States)	Magnitude	Zone
2025-02-03 14:05:12	**mb 4.5**	**Dodecanese Islands, Greece [Sea: Gr**
2025-02-03 13:17:42	**mb 4.8**	**Dodecanese Islands, Greece [Sea: Gr**
2025-02-03 12:50:48	**mb 4.8**	**Dodecanese Islands, Greece [Sea: Gr**
2025-02-03 12:21:01	**mb 4.7**	**Dodecanese Islands, Greece [Sea: Gr**
2025-02-03 11:01:01	ML 2.2	3 km S Marzano Appio (Caserta)
2025-02-03 10:45:08	**mb 4.7**	**Tunisia**
2025-02-03 10:29:45	**mb 4.9**	**Dodecanese Islands, Greece [Sea: Gr**
2025-02-03 09:26:36	**mb 4.9**	**Dodecanese Islands, Greece [Sea: Gr**
2025-02-03 09:10:20	**mb 4.7**	**Dodecanese Islands, Greece [Sea: Gr**
2025-02-03 09:01:03	**mb 4.9**	**Greece [Sea]**
2025-02-03 04:20:41	ML 2.0	6 km SE Siena (Siena)
2025-02-03 00:54:44	**mb 4.6**	**Dodecanese Islands, Greece [Sea: Gr**

2025-02-03 23:46:33	ML 2.5	Southern Tyrrhenian Sea (SEA)
2025-02-03 22:35:53	**Mwp 5.9**	**Halmahera, Indonesia [Sea: Indonesia]**
2025-02-03 22:10:25	ML 2.2	1 km SE Anzano di Puglia (Foggia)
2025-02-03 21:39:18	**mb 4.6**	**Dodecanese Islands, Greece [Sea: Greece]**
2025-02-03 21:19:42	**mb 4.8**	**Dodecanese Islands, Greece [Sea: Greece]**

2025-02-03 20:08:55	ML 2.5	Costa Marchigiana Pesarese (Pesaro Urbino)
2025-02-03 19:22:14	ML 2.6	Aeolian Islands (Messina)
2025-02-03 18:45:02	**mb 4.7**	**Dodecanese Islands, Greece [Sea: Greece]**
2025-02-03 14:39:50	ML 2.1	2 km E Cittareale (Rieti)

Date and Time (United States)	Magnitude	Zone
2025-02-06 13:55:42	ML 2.1	4 km Essa Aurunca (Caserta)
2025-02-06 12:28:37	ML 3.0	4 km from NW Monteroni d'Arbia (Si
2025-02-06 09:22:23	ML 2.0	Aeolian Islands (Messina)
2025-02-06 08:57:49	**mb 4.5**	**Dodecanese Islands, Greece [Sea: G**
2025-02-06 07:27:57	ML 2.2	3 km N Norcia (Perugia)
2025-02-06 07:22:01	**mb 4.7**	**Dodecanese Islands, Greece [Sea: G**
2025-02-06 06:51:53	**mb 4.8**	**Dodecanese Islands, Greece [Sea: G**
2025-02-06 05:08:18	**mb 4.5**	**Dodecanese Islands, Greece [Sea: G**
2025-02-06 04:36:47	**mb 4.8**	**Dodecanese Islands, Greece [Sea: G**
2025-02-06 04:33:54	**mb 4.6**	**Dodecanese Islands, Greece [Sea: G**
2025-02-06 04:00:23	**mb 4.6**	**Southern Greece [Land: Greece]**
2025-02-06 03:52:49	**mb 4.5**	**Dodecanese Islands, Greece [Sea: G**
2025-02-06 03:45:59	**mb 4.7**	**Dodecanese Islands, Greece [Sea: G**

Date and Time (United States)	Magnitude	Zone
2025-02-06 03:27:33	mb 4.7	Dodecanese Islands, Greece [Sea: Gr
2025-02-06 03:24:29	mb 4.5	Dodecanese Islands, Greece [Sea: Gr
2025-02-06 03:02:15	mb 4.6	Dodecanese Islands, Greece [Sea: Gr
2025-02-06 00:16:44	mb 4.5	Dodecanese Islands, Greece [Sea: Gr

2025-02-06 20:34:50	mb 4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-06 19:16:45	mb 4.6	Dodecanese Islands, Greece [Sea: Greece]
2025-02-06 18:03:00	ML 2.4	3 km E Scilla (Reggio Calabria)
2025-02-06 14:42:34	ML 3.6	Southern Tyrrhenian Sea (SEA)

Date and Time (United States)	Magnitude	Zone
2025-02-07 19:21:29	ML 2.2	Aeolian Islands (Messina)
2025-02-07 19:06:16	ML 3.1	Aeolian Islands (Messina)
2025-02-07 18:45:31	ML 2.0	6 km W Monteroni d'Arbia (Siena)
2025-02-07 18:37:09	ML 2.5	Aeolian Islands (Messina)
2025-02-07 18:11:46	ML 2.0	Aeolian Islands (Messina)
2025-02-07 18:08:17	ML 2.9	Aeolian Islands (Messina)
2025-02-07 18:04:39	ML 2.3	Aeolian Islands (Messina)

Date and Time (United States)	Magnitude	Zone
2025-02-07 17:36:14	ML 2.6	Aeolian Islands (Messina)
2025-02-07 17:31:31	ML 2.2	Aeolian Islands (Messina)
2025-02-07 17:26:19	ML 3.4	Aeolian Islands (Messina)
2025-02-07 17:04:39	ML 2.6	Aeolian Islands (Messina)
2025-02-07 16:48:13	ML 2.8	Aeolian Islands (Messina)
2025-02-07 16:42:49	ML 2.6	Aeolian Islands (Messina)
2025-02-07 16:40:19	ML 2.6	Aeolian Islands (Messina)
2025-02-07 16:19:12	**Mw 4.7**	**Aeolian Islands (Messina)**
2025-02-07 16:16:55	**mb 4.7**	**Dodecanese Islands, Greece [Sea: G**
2025-02-07 16:11:05	Md 2.0	Vesuvius (Naples)
2025-02-07 11:27:00	**Mwp 6.0**	**South of Tonga Islands [Sea: Tonga]**
2025-02-07 09:10:38	ML 2.5	3 km NE Grisolia (Cosenza)
2025-02-07 08:16:17	**mb 4.9**	**Dodecanese Islands, Greece [Sea: G**
2025-02-07 08:11:26	**mb 4.7**	**Dodecanese Islands, Greece [Sea: G**
2025-02-07 07:08:12	ML 3.1	Southern Strait of Sicily (MARE)
2025-02-07 05:31:59	**Mwp 5.8**	**Cocos Is. [Sea]**
2025-02-07 04:35:35	**mb 4.6**	**Dodecanese Islands, Greece [Sea: G**
2025-02-07 03:10:35	**mb 4.5**	**Dodecanese Islands, Greece [Sea: G**

Date and Time (United States)	Magnitude	Zone
2025-02-07 02:22:37	ML 2.3	Southern Tyrrhenian Sea (SEA)
2025-02-07 23:28:54	ML 2.4	Southern Tyrrhenian Sea (SEA)
2025-02-07 22:44:31	ML 2.2	Aeolian Islands (Messina)

On February 3rd, 6th and 7th, 21, 21 and 28 (70 in all) seismic events occurred. The day on which the highest number of earthquakes occurred in this period was **07.02.2025** with 28 **events**. The seismic maximums occurred on 3, 6 and 7 February:

February 3 - Greece, Tunisia, Central and Southern Italy and Indonesia

February 6 – South-Central Italy and Greece

February 7 – South-central Italy, Greece, Tonga Islands, Cocos Islands (maximum seismic maximum)

January 29 New Moon, February 12 Full Moon

Regarding the tide of Ischia and the days of maximum tide inherent to the high tide (12 and 13 February), we have:

12 February n.16 events:

2025-02-12 23:27:14	**Md 2.5**	**Campi Flegrei (Naples)**
2025-02-12 22:42:57	**Md 2.4**	**Phlegraean Fields**

2025-02-12 22:05:10	mb 4.5	Dodecanese Islands, Greece [Sea: Gr
2025-02-12 17:54:17	ML 2.1	3 km E Joppolo (Calabria)
2025-02-12 17:44:28	mb 4.6	Dodecanese Islands, Greece [Sea: Gr
2025-02-12 16:46:47	ML 2.6	Northern Ionian Sea (SEA)
2025-02-12 10:20:48	mb 5.0	Dodecanese Islands, Greece [Sea: Gr
2025-02-12 10:15:10	mb 4.9	Dodecanese Islands, Greece [Sea: Gr
2025-02-12 09:58:50	mb 4.7	Dodecanese Islands, Greece [Sea: Gr
2025-02-12 09:29:53	mb 5.0	Dodecanese Islands, Greece [Sea: Gr
2025-02-12 05:21:06	mb 4.5	Dodecanese Islands, Greece [Sea: Gr
2025-02-12 03:23:12	mb 4.5	Dodecanese Islands, Greece [Sea: Gr
2025-02-12 03:14:22	mb 4.7	Dodecanese Islands, Greece [Sea: Gr
2025-02-12 03:07:00	mb 4.4	Dodecanese Islands, Greece [Land: C
2025-02-12 02:35:10	mb 4.4	Dodecanese Islands, Greece [Sea: Gr
Date and Time (United States)	Magnitude	Zone
2025-02-12 02:14:56	Mwp 5.4	Dodecanese Islands, Greece [Sea: Gr

12 February – Greece, northern Ionian, Greece, Calabria, Greece, Campi Flegrei. So: Greece, northern Ionian, southern Italy

13 February n.11 events

2025-02-13 23:18:28	Md 2.6	Campi Flegrei (Naples)
2025-02-13 23:03:00	Md 2.0	Phlegraean Fields
2025-02-13 22:40:43	Md 2.3	Phlegraean Fields
2025-02-13 20:55:35	ML 2.0	5 km NE Cittareale (Rieti)
2025-02-13 18:47:19	ML 2.2	Southern Ionian Sea (SEA)
2025-02-13 16:42:41	**mb 4.7**	**Southern Greece [Sea: Greece]**
2025-02-13 16:34:22	Md 2.5	Phlegraean Fields
2025-02-13 15:49:45	ML 2.4	Strait of Messina (Reggio di Calabria, Messina)
2025-02-13 12:54:35	ML 2.0	5 km E Berchidda (Province of Sassari)
2025-02-13 11:43:23	ML 2.6	Austria-Germany border
2025-02-13 00:02:40	**MB 4.6**	**Dodecanese Islands, Greece [Sea: Greece]**

February 13 - Campania, Lazio, Southern Ionian, Greece, Campania, Sicily, Sardinia, Austria-Germany and Greece border. So: central-southern Italy, Greece and Austria-Germany border

Years with similar lunistices: 1873 – 1930 – 1968 – 1987 – 2006 – 2025

Earthquakes in Greece: 1968 – 1987 – 2006 – 2025

Let's take the years highlighted in red 1873 and 1987.

Data	Area epicentrale
1873-01-08 12:45	
1873-03-12 20:04	Appennino marchigiano
1873-04-19 15:15	Costa croata settentrionale
1873-05-16 19:35	Reggiano
1873-05-21 17	Moncalieri (TO)
1873-06-28 21:15	
1873-06-29 03:58	Alpago Cansiglio
1873-07-12 06:06	Val Comino
1873-08-03 21:53	Biellese
1873-08-20 14:30	Moncalieri (TO)
1873-09-11 09:03	Cosenza
1873-09-17	Appennino tosco-ligure
1873-09-20 13:30	Moncalieri (TO)
1873-11-06 08:30	Belluno
1873-12-03	Moncalieri (TO)
1873-12-03 07	Moncalieri (TO)
1873-12-13	Mignano Monte Lungo

Earthquakes in Italy (Greece) 1873

28 February – 1 March 1873 earthquake in Greece – Samos from 3-4 to 4-5

12 March 1873 Marche Apennines

16 May 1873 earthquake in Reggio Emilia

29 June 1873 earthquake in Alpago Cansiglio in the Belluno area (Veneto)

12 July 1873 earthquake in Val di Comino

3 August 1873 earthquake in the Biella area (Piedmont-Lombardy border)

11 September 1873 earthquake in Cosenza

17 September 1873 earthquake in the Tuscan-Ligurian Apennines

6 November 1873 earthquake in Belluno (Veneto) → Sicily (from Southern Seismic Radiant-Etna to Northern Seismic Radiant-Venetian Lagoon-Gulf of Trieste)

13 December 1873 earthquake in Mignano Monte Lungo (Casertano)

Data	Area epicentrale
1987-01-22 05:10	Costa pisano-livornese
1987-01-28 05:33	Potentino
1987-01-29 08:06	Tirreno meridionale
1987-01-29 13:35	Stretto di Sicilia
1987-02-02 16:08	Sicilia centro-orientale
1987-02-10 21:20	Lunigiana
1987-03-07 13:45	Alto Reatino
1987-04-04 17:38	Tirreno meridionale
1987-04-11 02:26	Colli Albani
1987-04-24 02:30	Reggiano
1987-05-02 20:43	Reggiano
1987-05-06 18:20	Etna - Vallone Licodia (S. Maria Li
1987-05-08 11:10	Bassa modenese
1987-05-24 10:23	Garda occidentale
1987-05-24 13:13	Tirreno meridionale
1987-06-06 22:54	Sicilia centrale
1987-06-29 13:07	Adriatico centrale
1987-07-03 10:21	Costa Marchigiana
1987-07-03 10:46	Canavese
1987-07-03 11:55	Costa Marchigiana
1987-07-03 17:38	Costa Marchigiana
1987-07-05 13:12	Montefeltro
1987-07-05 23:54	Costa Marchigiana
1987-07-08 04:29	Montefeltro
1987-07-10 08:09	Garda settentrionale
1987-07-11 01:46	Bassa Bolognese
1987-07-21 15:16	Lomellina
1987-08-13 07:22	Etna - Maletto
1987-09-01	Potentino
1987-09-04 16:42	Costa Marchigiana
1987-09-10 13:24	Costa Marchigiana
1987-09-22 04:24	Costa Marchigiana
1987-10-27 18:20	Tirreno meridionale
1987-12-15 07:35	Tirreno meridionale

Earthquakes in Italy (Greece) 1987

18 February 1987 Albania-Greece earthquake

07 March 1987 earthquake in the Upper Rieti area

2 May 1987 earthquake in Reggio Emilia

July 3, 1987 earthquake on the Marche coast and in the Canavese area (Piedmont)

10 July 1987 earthquake in northern Garda (Lombardy-Veneto-Trentino-Alto Adige)

July 21, 1987 earthquake in Lomellina in the province of Pavia in Western Lombardy

13 August 1987 earthquake near Etna

1 September 1987 earthquake in Potentino

22 September 1987 earthquake on the Marche coast

27 October 1987 earthquake in the southern Tyrrhenian Sea

15 December 1987 earthquake in the southern Tyrrhenian Sea

GENNAIO

Domenica	5	Gennaio	1873	21:27:39	◐	Primo quarto	♈	Ariete	15°41'57	377 376.72 km
Lunedì	13	Gennaio	1873	16:23:13	○	Luna Piena	♋	Cancro	23°38'02	404 271.42 km
Martedì	21	Gennaio	1873	20:30:45	◑	Ultimo quarto	♏	Scorpione	01°57'01	390 571.62 km
Martedì	28	Gennaio	1873	17:27:15	●	Luna Nuova	♒	Acquario	08°56'13	356 974.23 km

FEBBRAIO

Martedì	4	Febbraio	1873	10:05:57	◐	Primo quarto	♉	Toro	15°43'44	384 386.94 km
Mercoledì	12	Febbraio	1873	11:33:17	○	Luna Piena	♌	Leone	23°53'01	406 486.02 km
Giovedì	20	Febbraio	1873	11:23:24	◑	Ultimo quarto	♐	Sagittario	01°56'38	382 540.16 km
Giovedì	27	Febbraio	1873	03:22:32	●	Luna Nuova	♓	Pesci	08°38'51	357 598.79 km

MARZO

Giovedì	6	Marzo	1873	01:25:13	◐	Primo quarto	♊	Gemelli	15°34'52	392 324.18 km
Venerdì	14	Marzo	1873	05:44:38	○	Luna Piena	♍	Vergine	23°44'34	403 114.74 km
Venerdì	21	Marzo	1873	22:19:38	◑	Ultimo quarto	♑	Capricorno	01°22'57	375 835.01 km
Venerdì	28	Marzo	1873	12:54:31	●	Luna Nuova	♈	Ariete	07°55'22	362 867.24 km

APRILE

Venerdì	4	Aprile	1873	18:36:13	◐	Primo quarto	♋	Cancro	15°03'27	399 311.64 km
Sabato	12	Aprile	1873	21:51:26	○	Luna Piena	♎	Bilancia	23°02'19	395 217.77 km
Domenica	20	Aprile	1873	05:47:31	◑	Ultimo quarto	♒	Acquario	00°11'56	371 456.77 km
Sabato	26	Aprile	1873	22:42:24	●	Luna Nuova	♉	Toro	06°43'34	371 669.70 km

MAGGIO

Domenica	4	Maggio	1873	12:33:28	◐	Primo quarto	♌	Leone	14°04'33	403 542.04 km
Lunedì	12	Maggio	1873	11:17:54	○	Luna Piena	♏	Scorpione	21°45'09	384 793.48 km
Lunedì	19	Maggio	1873	11:00:10	◑	Ultimo quarto	♒	Acquario	28°28'49	369 711.58 km
Lunedì	26	Maggio	1873	09:20:23	●	Luna Nuova	♊	Gemelli	05°08'20	382 345.90 km

GIUGNO

Martedì	3	Giugno	1873	06:19:37	◐	Primo quarto	♍	Vergine	12°41'09	403 973.62 km
Martedì	10	Giugno	1873	22:01:28	○	Luna Piena	♐	Sagittario	20°00'10	374 059.61 km
Martedì	17	Giugno	1873	15:31:56	◑	Ultimo quarto	♓	Pesci	26°25'35	370 625.66 km
Martedì	24	Giugno	1873	21:12:32	●	Luna Nuova	♋	Cancro	03°19'52	392 935.27 km

LUGLIO

Mercoledì	2	Luglio	1873	23:10:29	◐	Primo quarto	♎	Bilancia	11°02'17	400 582.40 km
Giovedì	10	Luglio	1873	06:33:33	○	Luna Piena	♑	Capricorno	18°00'12	364 937.25 km
Mercoledì	16	Luglio	1873	20:58:12	◑	Ultimo quarto	♈	Ariete	24°17'52	374 150.41 km
Giovedì	24	Luglio	1873	10:34:01	●	Luna Nuova	♌	Leone	01°31'27	401 441.06 km

AGOSTO

Venerdì	1	Agosto	1873	14:29:32	◐	Primo quarto	♏	Scorpione	09°19'58	394 296.67 km
Venerdì	8	Agosto	1873	13:52:23	○	Luna Piena	♒	Acquario	16°00'52	358 863.12 km
Venerdì	15	Agosto	1873	04:41:19	◑	Ultimo quarto	♉	Toro	22°22'05	380 029.97 km
Sabato	23	Agosto	1873	01:30:42	●	Luna Nuova	♌	Leone	29°56'49	406 124.07 km
Domenica	31	Agosto	1873	03:48:19	◐	Primo quarto	♐	Sagittario	07°46'20	386 706.21 km

SETTEMBRE

Sabato	6	Settembre	1873	21:09:13	○	Luna Piena	♓	Pesci	14°17'26	356 800.26 km
Sabato	13	Settembre	1873	15:40:46	◑	Ultimo quarto	♊	Gemelli	20°52'44	387 524.62 km
Domenica	21	Settembre	1873	17:51:09	●	Luna Nuova	♍	Vergine	28°47'10	405 835.96 km
Lunedì	29	Settembre	1873	14:56:14	◐	Primo quarto	♑	Capricorno	06°31'13	379 521.93 km

OTTOBRE

Lunedì	6	Ottobre	1873	05:31:42	○	Luna Piena	♈	Ariete	13°01'52	359 230.29 km
Lunedì	13	Ottobre	1873	06:25:42	◑	Ultimo quarto	♋	Cancro	19°59'33	395 270.02 km
Martedì	21	Ottobre	1873	10:55:19	●	Luna Nuova	♎	Bilancia	28°07'48	400 400.27 km
Mercoledì	29	Ottobre	1873	00:09:59	◐	Primo quarto	♒	Acquario	05°40'09	374 030.81 km

NOVEMBRE

Martedì	4	Novembre	1873	15:48:31	○	Luna Piena	♉	Toro	12°19'51	366 001.77 km
Mercoledì	12	Novembre	1873	00:48:19	◑	Ultimo quarto	♌	Leone	19°44'34	401 444.39 km
Giovedì	20	Novembre	1873	03:36:47	●	Luna Nuova	♏	Scorpione	27°55'58	390 888.15 km
Giovedì	27	Novembre	1873	08:13:03	◐	Primo quarto	♓	Pesci	05°12'42	370 929.30 km

DICEMBRE

Giovedì	4	Dicembre	1873	04:20:34	○	Luna Piena	♊	Gemelli	12°08'45	376 096.31 km
Giovedì	11	Dicembre	1873	21:54:16	◑	Ultimo quarto	♍	Vergine	20°00'06	404 249.93 km
Venerdì	19	Dicembre	1873	18:49:33	●	Luna Nuova	♐	Sagittario	28°00'59	379 457.91 km
Venerdì	26	Dicembre	1873	16:04:48	◐	Primo quarto	♈	Ariete	05°02'02	370 543.05 km

GENNAIO									
Martedì	6	Gennaio	1987	22:34:27	◐	Primo quarto	♈	Ariete	16°04'37	388 961.86 km
Giovedì	15	Gennaio	1987	02:30:24	○	Luna Piena	♋	Cancro	24°23'39	405 188.71 km
Giovedì	22	Gennaio	1987	22:45:23	◑	Ultimo quarto	♏	Scorpione	02°22'40	378 561.30 km
Giovedì	29	Gennaio	1987	13:44:31	●	Luna Nuova	♒	Acquario	09°06'52	360 023.51 km
FEBBRAIO									
Giovedì	5	Febbraio	1987	16:20:44	◐	Primo quarto	♉	Toro	16°19'49	396 768.92 km
Venerdì	13	Febbraio	1987	20:57:55	○	Luna Piena	♌	Leone	24°37'19	398 813.09 km
Sabato	21	Febbraio	1987	08:55:50	◑	Ultimo quarto	♐	Sagittario	02°11'18	373 111.84 km
Sabato	28	Febbraio	1987	00:50:38	●	Luna Nuova	♓	Pesci	08°53'39	367 748.53 km
MARZO									
Sabato	7	Marzo	1987	11:58:06	◐	Primo quarto	♊	Gemelli	16°22'48	402 425.16 km
Domenica	15	Marzo	1987	13:12:41	○	Luna Piena	♍	Vergine	24°25'09	388 828.72 km
Domenica	22	Marzo	1987	16:21:40	◑	Ultimo quarto	♑	Capricorno	01°30'36	370 289.63 km
Domenica	29	Marzo	1987	12:45:33	●	Luna Nuova	♈	Ariete	08°17'51	378 248.48 km
APRILE									
Lunedì	6	Aprile	1987	07:47:40	◐	Primo quarto	♋	Cancro	15°59'13	404 357.23 km
Martedì	14	Aprile	1987	02:30:58	○	Luna Piena	♎	Bilancia	23°37'33	377 675.13 km
Lunedì	20	Aprile	1987	22:15:11	◑	Ultimo quarto	♒	Acquario	00°17'48	370 201.64 km
Martedì	28	Aprile	1987	01:34:22	●	Luna Nuova	♉	Toro	07°15'12	389 396.67 km
MAGGIO									
Mercoledì	6	Maggio	1987	02:25:38	◐	Primo quarto	♌	Leone	15°03'14	402 157.10 km
Mercoledì	13	Maggio	1987	12:50:14	○	Luna Piena	♏	Scorpione	22°14'22	367 660.86 km
Mercoledì	20	Maggio	1987	04:02:23	◑	Ultimo quarto	♒	Acquario	28°37'54	372 796.18 km
Mercoledì	27	Maggio	1987	15:13:21	●	Luna Nuova	♊	Gemelli	05°48'34	398 967.49 km
GIUGNO									
Giovedì	4	Giugno	1987	18:52:39	◐	Primo quarto	♍	Vergine	13°37'35	396 586.59 km
Giovedì	11	Giugno	1987	20:48:48	○	Luna Piena	♐	Sagittario	20°23'53	360 470.02 km
Giovedì	18	Giugno	1987	11:02:30	◑	Ultimo quarto	♓	Pesci	26°41'37	377 865.66 km
Venerdì	26	Giugno	1987	05:36:50	●	Luna Nuova	♋	Cancro	04°06'45	405 081.14 km
LUGLIO									
Sabato	4	Luglio	1987	08:34:10	◐	Primo quarto	♎	Bilancia	11°51'34	389 193.77 km
Sabato	11	Luglio	1987	03:32:36	○	Luna Piena	♑	Capricorno	18°19'54	357 106.03 km
Venerdì	17	Luglio	1987	20:16:49	◑	Ultimo quarto	♈	Ariete	24°43'02	384 810.03 km
Sabato	25	Luglio	1987	20:37:32	●	Luna Nuova	♌	Leone	02°22'10	406 522.03 km
AGOSTO									
Domenica	2	Agosto	1987	19:23:58	◐	Primo quarto	♏	Scorpione	09°58'13	381 727.58 km
Domenica	9	Agosto	1987	10:17:19	○	Luna Piena	♒	Acquario	16°18'34	358 017.70 km
Domenica	16	Agosto	1987	08:24:59	◑	Ultimo quarto	♉	Toro	22°57'05	392 484.85 km
Lunedì	24	Agosto	1987	11:58:37	●	Luna Nuova	♍	Vergine	00°47'46	402 942.68 km
SETTEMBRE									
Martedì	1	Settembre	1987	03:47:38	◐	Primo quarto	♐	Sagittario	08°11'38	375 586.39 km
Lunedì	7	Settembre	1987	18:12:52	○	Luna Piena	♓	Pesci	14°35'17	363 156.26 km
Lunedì	14	Settembre	1987	23:44:28	◑	Ultimo quarto	♊	Gemelli	21°36'59	399 302.41 km
Mercoledì	23	Settembre	1987	03:08:13	●	Luna Nuova	♍	Vergine	29°34'01	394 993.79 km
Mercoledì	30	Settembre	1987	10:39:02	◐	Primo quarto	♑	Capricorno	06°44'22	371 596.90 km
OTTOBRE									
Mercoledì	7	Ottobre	1987	04:12:15	○	Luna Piena	♈	Ariete	13°21'52	371 880.92 km
Mercoledì	14	Ottobre	1987	18:05:35	◑	Ultimo quarto	♋	Cancro	20°51'17	403 547.15 km
Giovedì	22	Ottobre	1987	17:27:52	●	Luna Nuova	♎	Bilancia	28°46'26	384 284.85 km
Giovedì	29	Ottobre	1987	17:10:17	◐	Primo quarto	♒	Acquario	05°44'35	370 164.08 km
NOVEMBRE									
Giovedì	5	Novembre	1987	16:45:50	○	Luna Piena	♉	Toro	12°43'48	382 804.45 km
Venerdì	13	Novembre	1987	14:38:11	◑	Ultimo quarto	♌	Leone	20°40'31	403 869.42 km
Sabato	21	Novembre	1987	06:32:53	●	Luna Nuova	♏	Scorpione	28°24'09	373 053.01 km
Sabato	28	Novembre	1987	00:37:00	◐	Primo quarto	♓	Pesci	05°13'56	371 508.32 km
DICEMBRE									
Sabato	5	Dicembre	1987	08:00:59	○	Luna Piena	♊	Gemelli	12°38'18	393 797.72 km
Domenica	13	Dicembre	1987	11:41:14	◑	Ultimo quarto	♍	Vergine	20°55'09	399 958.63 km
Domenica	20	Dicembre	1987	18:25:16	●	Luna Nuova	♐	Sagittario	28°19'47	363 629.82 km
Domenica	27	Dicembre	1987	10:00:43	◐	Primo quarto	♈	Ariete	05°06'20	375 654.43 km

(In the previous two pages, lunistices of the years 1873 and 1987)

Observing the seismicity of the years 1892, 1911, 1930, 1949, 1968, 1987 and 2006, in the period between February and March, there is a clear preponderance regarding the epicentral location of seismic activity in the south of the Italian Peninsula

Forecast

15 September 1924 earthquake in the Rieti Mountains Magnitude about 4

(September 13, 1924 Full Moon)

Adding the time period equal to 100.45651 years

September 15, 1924 + **100.45651 years** =

February 28, 2025

This date coincides with a New Moon, and also with a great evening alignment of Saturn, Mercury, Neptune, Venus, Uranus, Jupiter and Mars. In addition, by making the following calculation, we get:

June 7, 1924 Opposition of Jupiter

December 22, 1924 Conjunction of Jupiter

Let's calculate the days between June 7th and December 22nd:

(23+31+31+30+31+30+22)/2 = 99 days

June 7, 1924 + 99 days =

September 14, 1924

This date differs by one day from the event of September 15th reported above and by two days from the full moon. Therefore, we are led to believe, at least from a statistical-mathematical point of view, that in the time interval between February 28 (New Moon, tide of Syzygies) and March 14, 2025 (Full Moon, tide of Syzygies), with an average around March 7, a seismic maximum will hit central-southern Italy, just as on March 12, 1873 a strong earthquake struck the southern Marche and was felt in almost all of Italy.

14 February 2025, Michele Nardelli